

**Table 4.8. Adult attachment style on the Experiences in Close Relationships Inventory in 4 groups of participants who had spent different amounts of time in institutions and entered under different circumstances.**

Adult Attachment Style		Group 1	Group 2	Group 3	Group 4	Chi Square	Group Diffs
		N=108	N=67	N=22	N=48		
Secure	f	18.00	13.00	4.00	6.00	7.29	NS
	%	16.70	19.40	18.20	12.50		
Fearful	f	52.00	27.00	9.00	19.00		
	%	48.10	40.30	40.90	39.60		
Preoccupied	f	10.00	7.00	3.00	11.00		
	%	9.30	10.40	13.60	22.90		
Dismissive	f	28.00	20.00	6.00	12.00		
	%	25.90	29.90	27.30	25.00		

**Note:** Group 1 spent more than 12 years in an institution and entered before age 5. Group 2 spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. Group 3 spent 5-11 years in an institution and placement occurred through the courts. Group 4 spent 4 or fewer years in institutions. Cases were classified as falling into the four attachment style categories using the Experiences in Close Relationships Inventory, SPSS algorithm in Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press. Within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. NS=Not significant.

**Table 4.9. Strengths in 4 groups of participants who had spent different amounts of time in institutions and entered under different circumstances.**

<b>Variable</b>		<b>Group 1</b> N=110	<b>Group 2</b> N=67	<b>Group 3</b> N=22	<b>Group 4</b> N=48	<b>Chi Square</b>	<b>Group Diff's</b>
Where does your strength come from?	f	8.00	8.00	7.00	17.00	37.72***	4>1,2
	%	7.50	12.10	31.80	35.40		
	f	15.00	3.00	0.00	1.00		
	%	14.00	4.50	0.00	2.10		
Relationship with current partner	f	15.00	11.00	2.00	12.00	NS	NS
	%	14.00	16.70	9.10	25.00		
	f	69.00	44.00	13.00	18.00		
	%	64.50	66.70	59.10	37.50		
Self-reliance, my optimism, my work, my skills	f	22.00	19.00	7.00	15.00	13.84	NS
	%	20.60	28.40	31.80	31.90		
	f	11.00	1.00	0.00	2.00		
	%	10.30	1.50	0.00	4.30		
Relationship with current partner	f	9.00	11.00	1.00	4.00		
	%	8.40	16.40	4.50	8.50		
	f	65.00	36.00	14.00	26.00		
	%	60.70	53.70	63.60	55.30		
Relationship with a friend including other survivors	f	11.00	1.00	0.00	2.00		
	%	10.30	1.50	0.00	4.30		
	f	9.00	11.00	1.00	4.00		
	%	8.40	16.40	4.50	8.50		
Relationship with God or spiritual force	f	65.00	36.00	14.00	26.00		
	%	60.70	53.70	63.60	55.30		
	f	11.00	1.00	0.00	2.00		
	%	10.30	1.50	0.00	4.30		
Self-reliance, my optimism, my work, my skills	f	9.00	11.00	1.00	4.00		
	%	8.40	16.40	4.50	8.50		
	f	65.00	36.00	14.00	26.00		
	%	60.70	53.70	63.60	55.30		
What has helped you most in facing life challenges?	f	22.00	19.00	7.00	15.00	13.84	NS
	%	20.60	28.40	31.80	31.90		
	f	11.00	1.00	0.00	2.00		
	%	10.30	1.50	0.00	4.30		
Relationship with a friend including other survivors	f	9.00	11.00	1.00	4.00		
	%	8.40	16.40	4.50	8.50		
	f	65.00	36.00	14.00	26.00		
	%	60.70	53.70	63.60	55.30		
Relationship with God or spiritual force	f	65.00	36.00	14.00	26.00		
	%	60.70	53.70	63.60	55.30		
	f	11.00	1.00	0.00	2.00		
	%	10.30	1.50	0.00	4.30		
Self-reliance, my optimism, my work, my skills	f	9.00	11.00	1.00	4.00		
	%	8.40	16.40	4.50	8.50		
	f	65.00	36.00	14.00	26.00		
	%	60.70	53.70	63.60	55.30		
What is the thing that means most to you in your life?	f	22.00	19.00	7.00	15.00	13.84	NS
	%	20.60	28.40	31.80	31.90		
	f	11.00	1.00	0.00	2.00		
	%	10.30	1.50	0.00	4.30		
Relationship with current partner	f	9.00	11.00	1.00	4.00		
	%	8.40	16.40	4.50	8.50		
	f	65.00	36.00	14.00	26.00		
	%	60.70	53.70	63.60	55.30		

Variable		Group 1 N=110	Group 2 N=67	Group 3 N=22	Group 4 N=48	Chi Square	Group Diffs
Relationship with partner	f	12.00	9.00	4.00	8.00	9.57	NS
	%	11.10	13.40	20.00	17.00		
Relationship with a friend including other Survivors	f	7.00	4.00	0.00	1.00		
	%	6.50	6.00	0.00	2.10		
Relationship with God or spiritual force	f	3.00	2.00	1.00	1.00		
	%	2.80	3.00	5.00	2.10		
Self-reliance, my optimism, my work, my skills	f	31.00	11.00	3.00	8.00		
	%	28.70	16.40	15.00	17.00		
Relationship with Children / Family	f	55.00	41.00	12.00	29.00		
	%	50.90	61.20	60.00	61.70		

**Note:** Group 1 spent more than 12 years in an institution and entered before age 5. Group 2 spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. Group 3 spent 5-11 years in an institution and placement occurred through the courts. Group 4 spent 4 or fewer years in institutions. Within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. Group differences were interpreted as significant if standardised residuals exceeded an absolute value of 2. \*\*\*p<.001.

**Table 4.10. Profiles of 4 groups of participants who had spent different amounts of time in institutions and entered under different circumstances.**

	<b>Group 1 12 years Entered before 5 years</b>	<b>Group 2 5-11 years Entered due to parental problems</b>	<b>Group 3 5-11 years Entered through courts</b>	<b>Group 4 Under 4 years</b>
<b>PAST HISTORY &amp; DEMOGRAPHICS</b>				
Few years with family before entry	+	-	-	<b>0</b>
Many years in institution	+	-	-	<b>0</b>
<b>Entry reason</b>				
Illegitimate	+	-	-	-
Parents unable to care	+	+	-	-
Parental death	+	+	-	-
Through courts for petty crime	-	-	+	+
<b>Leaving reason</b>				
Too old	+	+	+	-
Institution closed	-	-	+	-
Sentence over	-	-	-	+
Family wanted person back	-	-	-	+
<b>Institution management</b>				
Nuns	+	+	-	-
Religious brothers & priests	-	-	+	+
Both	+	-	-	-
<b>Mixed feelings leaving</b>	+	-	-	<b>0</b>
<b>Gender</b>				
Male	-	-	+	+
Female	+	+	-	-
<b>INSTITUTIONAL ABUSE</b>				
Physical institutional abuse	+	-	-	<b>0</b>
Physical abuse began at an early age	+	-	-	<b>0</b>
Physical abuse lasted many years	+	-	-	<b>0</b>
Sexual institutional abuse	-	-	+	+
Sexual abuse began at an early age	+	+	-	-
Worst thing in institution was severe sexual abuse	<b>0</b>	<b>0</b>	+	-
Worst thing in institution was severe emotional abuse	+	+	-	-
Worst thing began at an early age	+	-	-	<b>0</b>
Worst thing lasted a long time	+	-	-	<b>0</b>
<b>FAMILY-BASED CHILD ABUSE</b>				
Physical abuse	<b>0</b>	<b>0</b>	+	-
<b>ADULT PSYCHOLOGICAL ADJUSTMENT</b>				
<b>Psychological disorders</b>				
Alcohol & Substance use disorder, lifetime	-	-	+	+
Antisocial personality disorder	-	-	+	+
<b>Multiple life problems</b> (substance use, crime, unemployment)	-	-	+	+
<b>Strengths</b>				
Relationship with partner	<b>0</b>	<b>0</b>	-	+
Relationship with friends	+	-	-	-
Self-reliance, optimism, work, skills	+	+	+	-

**Note:** +=the feature was a significant feature of the group profile. 0=the feature was not a significant element of the group profile. - a moderate level of the feature characterized the groups profile.

**Table 4.11. Historical and demographic characteristics on which four groups who reported suffering differing types of worst abusive experiences in institutions differed significantly**

Variable	Categories	Group 1 S&P abuse N=23	Group 2 P abuse N=99	Group 3 S abuse N=40	Group 4 E Abuse N=85	Chi Square or ANOVA F	Group Diff
<b>Gender (N=247)</b>	Male	f 15.00 % 65.20	55.00 55.60	35.00 87.50	30.00 35.30	31.34***	3>4
	Female	f 8.00 % 34.80	44.00 44.40	5.00 12.50	55.00 64.70		
<b>Age in years (N=247)</b>		M 56.74 SD 8.57	62.22 8.34	57.55 7.36	59.60 8.13	4.96**	2>3,1
		M 4.75 SD 3.82	5.71 4.76	7.78 4.96	4.09 3.78		
<b>Years with family before entering an institution (N=246)</b>		M 10.96 SD 4.98	9.74 5.34	7.75 5.46	11.21 4.63	4.57**	4>3
		f 2.00 % 8.70	18.00 18.20	4.00 10.00	24.00 28.90		
<b>Reason for entering an institution (N=245)</b>	Illegitimate	f 5.00 % 21.70	29.00 29.30	19.00 47.50	5.00 6.00		
	Petty crime	f 12.00 % 52.20	40.00 40.40	13.00 32.50	39.00 47.00		
<b>Institution management (N=247)</b>	Parents could not provide care	f 4.00 % 17.40	12.00 12.10	4.00 10.00	15.00 18.10		
	Parent died	f 9.00 % 39.10	46.00 46.50	8.00 20.00	58.00 68.20		
	Nuns						

Variable	Categories	Group 1 S&P abuse N=23	Group 2 P abuse N=99	Group 3 S abuse N=40	Group 4 E Abuse N=85	Chi Square or ANOVA F	Group Diff
<b>Were you happy to leave the institution? (N=247)</b>	Religious brothers and priests	f 7.00 30.40	35.00 35.40	24.00 60.00	11.00 12.90		3>4
	Priests, religious brothers and Nuns	f 7.00 30.40	18.00 18.20	8.00 20.00	16.00 18.80		
	Yes	f 12.00 52.20	62.00 62.60	35.00 87.50	43.00 50.60	17.75**	3>4
	Mixed feelings	f 9.00 39.10	32.00 32.30	5.00 12.50	38.00 44.70		4>3
<b>Education - highest exam (N=244)</b>	No	f 2.00 8.70	5.00 5.10	0.00 0.00	4.00 4.70		
	None	f 8.00 34.80	64.00 66.00	18.00 45.00	31.00 36.90	33.30**	2>1,4
	Junior school exam in 5 <sup>th</sup> or 6 <sup>th</sup> class (e.g. primary cert)	f 12.00 52.20	19.00 19.60	8.00 20.00	23.00 27.40		1>2,3
	Inter/Leaving Cert.	f 1.00 4.30	8.00 8.20	9.00 22.50	11.00 13.10		
<b>Children's living arrangements (N=211)</b>	Certificate, diploma, apprenticeship exam, or primary degree	f 2.00 8.70	6.00 6.20	5.00 12.50	19.00 22.60		4>2
	Spent some time living with their other parent	f 5.00 25.00	11.00 12.60	9.00 26.50	3.00 4.30	22.63**	1,3>4

Variable	Categories		Group 1 S&P abuse N=23	Group 2 P abuse N=99	Group 3 S abuse N=40	Group 4 E Abuse N=85	Chi Square or ANOVA F	Group Diff's
	Spent some time living with their relatives or in Care	f %	0.00 0.00	7.00 8.00	1.00 2.90	8.00 11.40		
	Always lived with respondent	f %	15.00 75.00	64.00 73.60	24.00 70.60	59.00 84.30		
	Children put up for adoption	f %	0.00 0.00	5.00 5.70	0.00 0.00	0.00 0.00		2>1,3,4

**Note:** Group 1 contained 23 cases where the worst thing reported was severe physical and sexual abuse. Group 2 contained 99 cases where it was severe physical abuse. Group 3 contained 40 cases where it was severe sexual abuse. Group 4 contained 85 cases where it was severe emotional abuse. Participants' statements were classified as severe physical abuse if they reported physical violence, beating, slapping, or being physically injured, but not having medical attention withheld. Statements were classified as severe sexual abuse if the person reported the words sexual abuse or mentioned rape; genital, anal or oral sex; masturbation; or other coercive sexual activities involving either staff or older pupils. Statements were classified as severe physical and sexual abuse if they involved both severe physical abuse and severe sexual abuse as defined earlier. Statements of actions involving humiliation, degradation, severe lack of care, withholding medical treatment, witnessing the traumatization of other pupils and adverse experiences that were not clearly classifiable as severe sexual or physical abuse were classified as severe emotional abuse. Inter-rater agreement greater than 90% was achieved for a sample of 10% of statements. Details of statements are in Table 3.4. For each variable with multiple categories, within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. For continuous variables F values are from one-way analysis of variance and inter-group differences are based on Scheffe post hoc tests for comparing groups with unequal Ns that were significant at p<.05. For categorical variables, where chi square tests were significant at p<.05, group differences were interpreted as significant if standardised residuals exceeded an absolute value of 2. \*\*p<.01. \*\*\*p<.001

**Table 4.12. Recollections of child abuse in four groups who reported suffering differing types of worst abusive experiences in institutions**

<b>Variable</b>		<b>Group 1 S&amp;P Abuse N=23</b>	<b>Group 2 P abuse N=99</b>	<b>Group 3 S abuse N=40</b>	<b>Group 4 E Abuse N=85</b>	<b>ANOVA F</b>	<b>Group Diffs</b>
<b>INSTITUTIONAL ABUSE IAS (N=247) CTQ-Institution (N=247)</b>	Specific institutional abuse	M SD 55.56 8.94	49.50 9.29	52.02 9.64	48.12 10.66	4.16**	1>3>2,4
	Total institutional abuse score	M SD 58.47 7.94	49.22 8.23	56.41 9.92	45.60 9.59	20.65***	1>3>2>4
	Physical abuse	M SD 54.75 6.98	51.70 8.96	51.55 9.29	45.99 10.92	8.20***	1>2,3>4
	Sexual abuse	M SD 59.13 9.61	47.20 8.52	61.66 7.51	45.31 6.21	55.55***	1,3>2,4
	Emotional abuse	M SD 53.91 7.60	50.12 9.91	51.00 9.37	48.33 10.73	2.12	NS
	Physical neglect	M SD 54.99 8.63	50.71 9.50	49.13 10.11	48.18 10.47	3.20	NS
	Emotional neglect	M SD 50.46 10.81	49.75 8.57	50.49 10.83	49.95 11.07	0.07	NS



Variable		Group 1 S&P Abuse N=23	Group 2 P abuse N=99	Group 3 S abuse N=40	Group 4 E Abuse N=85	ANOVA F	Group Diffs
SPSA-Institution (N=247)	Total severe institutional abuse	M SD 55.34 4.81	M SD 48.40 4.79	M SD 54.30 5.13	M SD 48.40 5.85	22.70***	1,3>2,4
	Severe institutional physical abuse	M SD 54.07 7.54	M SD 49.59 9.45	M SD 49.90 9.87	M SD 49.37 11.08	1.45	NS
	Severe institutional sexual abuse	M SD 58.88 7.55	M SD 46.73 8.64	M SD 59.54 5.78	M SD 46.89 9.33	34.57***	1,3>2,4

**Note:** Group 1 contained 23 cases where the worst thing reported was severe physical and sexual abuse. Group 2 contained 99 cases where it was severe physical abuse. Group 3 contained 40 cases where it was severe sexual abuse. Group 4 contained 85 cases where it was severe emotional abuse. Participants' statements were classified as severe physical abuse if they reported physical violence, beating, slapping, or being physically injured, but not having medical attention withheld. Statements were classified as severe sexual abuse if the person reported the words sexual abuse or mentioned rape; genital, anal or oral sex; masturbation; or other coercive sexual activities involving either staff or older pupils. Statements were classified as severe physical and sexual abuse if they involved both severe physical abuse and severe sexual abuse as defined earlier. Statements of actions involving humiliation, degradation, severe lack of care, withholding medical treatment, witnessing the traumatization of other pupils and adverse experiences that were not clearly classifiable as severe sexual or physical abuse were classified as severe emotional abuse. Inter-rater agreement greater than 90% was achieved for a sample of 10% of statements. Details of statements are in Table 3.4. CTQ=Childhood Trauma Questionnaire (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse. To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before ANOVAs were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. F values are from one-way analysis of variance and inter-group differences are based on Scheffe post hoc tests for comparing groups with unequal Ns that were significant at p<.05. For the MANOVA on all subscales of the institution versions of the CTQ, SPSA & the IAS, F (24, 685) = 7.30, p<.001. For the MANOVA on all subscales of the family versions of the CTQ and SPSA, F (21, 319) = 1.31, p=NS. \*\*p<.01. \*\*\*p<.001.

**Table 4.13. Timing of severe abuse and worst abuse in four groups who reported suffering differing types of worst abusive experiences in institutions**

<b>Variable</b>		<b>Group 1 S&amp;P abuse N=23</b>	<b>Group 2 P abuse N=99</b>	<b>Group 3 S abuse N=40</b>	<b>Group 4 E Abuse N=85</b>	<b>Chi Square</b>	<b>Group Diff</b>
<b>Age when most severe form of physical abuse began (N=233)</b>	M SD	8.06 3.02	8.91 3.49	9.50 4.24	7.60 3.56	3.00	NS
<b>Duration of most severe form of physical abuse (N=229)</b>	M SD	6.67 3.66	6.49 4.58	5.94 4.71	7.45 4.26	1.18	NS
<b>Age when most severe form of sexual abuse began (N=122)</b>	M SD	10.28 2.63	11.06 2.64	11.36 2.76	9.79 3.27	2.02	NS
<b>Duration of most severe form of sexual abuse (N=111)</b>	M SD	3.04 2.46	2.75 3.12	2.09 2.15	3.34 3.99	1.01	NS
<b>Age when worst thing began (N=237)</b>	M SD	9.20 2.92	9.02 3.65	11.48 2.95	8.24 3.71	7.72***	3>1,2>4
<b>Duration of worst thing (N=225)</b>	M SD	4.49 3.67	5.86 4.49	2.63 2.82	5.92 5.40	5.70***	2,4>3

**Note:** Group 1 contained 23 cases where the worst thing reported was severe physical and sexual abuse. Group 2 contained 99 cases where it was severe physical abuse. Group 3 contained 40 cases where it was severe sexual abuse. Group 4 contained 85 cases where it was severe emotional abuse. Participants' statements were classified as severe physical abuse if they reported physical violence, beating, slapping, or being physically injured, but not having medical attention withheld. Statements were classified as severe sexual abuse if the person reported the words sexual abuse or mentioned rape; genital, anal or oral sex; masturbation; or other coercive sexual activities involving either staff or older pupils. Statements were classified as severe physical and sexual abuse if they involved both severe physical abuse and severe sexual abuse as defined earlier. Statements of actions involving humiliation, degradation, severe lack of care, withholding medical treatment, witnessing the traumatization of other pupils and adverse experiences that were not clearly classifiable as severe sexual or physical abuse were classified as severe emotional abuse. Inter-rater agreement greater than 90% was achieved for a sample of 10% of statements. Details of statements are in Table 3.4.

F values are from one-way analysis of variance and inter-group differences are based on Scheffe post hoc tests for comparing groups with unequal Ns that were significant at p<.05. \*\*\*p<.001

**Table 4.14. Psychological disorders in four groups who reported suffering differing types of worst abusive experiences in institutions**

<b>Variable</b>		<b>Group 1 S&amp;P abuse N=23</b>	<b>Group 2 P abuse N=99</b>	<b>Group 3 S abuse N=40</b>	<b>Group 4 E Abuse N=85</b>	<b>Chi Square</b>	<b>Group Diff</b>
<b>Anxiety disorders</b>							
Posttraumatic stress disorder, current	f %	8.00 34.80	10.00 10.10	14.00 35.00	9.00 10.60	20.51***	1,3>2,4
<b>Alcohol and substance use disorders</b>							
Any alcohol and substance use disorder, lifetime	f %	12.00 52.20	33.00 33.30	23.00 57.50	20.00 23.50	16.74***	3>4
Alcohol dependence, lifetime	f %	7.00 30.40	27.00 27.30	20.00 50.00	12.00 14.10	18.14***	3>4
<b>Personality disorders</b>							
Antisocial personality disorder	f %	2.00 8.70	4.00 4.00	9.00 22.50	2.00 2.40	19.31***	3>4

**Note:** Group 1 contained 23 cases where the worst thing reported was severe physical and sexual abuse. Group 2 contained 99 cases where it was severe physical abuse. Group 3 contained 40 cases where it was severe sexual abuse. Group 4 contained 85 cases where it was severe emotional abuse. Participants' statements were classified as severe physical abuse if they reported physical violence, beating, slapping, or being physically injured, but not having medical attention withheld. Statements were classified as severe sexual abuse if the person reported the words sexual abuse or mentioned rape; genital, anal or oral sex; masturbation; or other coercive sexual activities involving either staff or older pupils. Statements were classified as severe physical and sexual abuse if they involved both severe physical abuse and severe sexual abuse as defined earlier. Statements of actions involving humiliation, degradation, severe lack of care, withholding medical treatment, witnessing the traumatization of other pupils and adverse experiences that were not clearly classifiable as severe sexual or physical abuse were classified as severe emotional abuse. Inter-rater agreement greater than 90% was achieved for a sample of 10% of statements. Details of statements are in Table 3.4. Diagnoses were made using the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press) and SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders, (SCID-II)*. Washington, DC: American Psychiatric Press). Psychological disorders do not represent mutually exclusive categories and so percentages within and across groups sum to more than 100%. Where chi square tests were significant at  $p < .01$ , group differences were interpreted as significant if standardised residuals exceeded an absolute value of 2. \*\*\* $p < .001$ .

Table 4.15. Current adjustment of participants in four groups who reported suffering differing types of worst abusive experiences in institutions

		Group 1 S&P abuse N=23	Group 2 P abuse N=99	Group 3 S Abuse N=40	Group 4 E Abuse N=85	ANOVA F	Group Diff
Total trauma symptoms (TSI) (N=247)	M SD	54.74 8.32	49.14 10.76	53.24 9.44	48.20 9.11	4.46**	1,3>4
Total No of life problems (LPC) (N=247)	M SD	51.06 10.79	49.66 8.35	57.46 11.99	46.59 8.66	12.37***	3>2>4
Total quality of life (WHOQOL) (N=247)	M SD	47.44 9.90	50.57 9.92	49.43 10.42	50.30 9.98	0.68	NS
Global functioning (GAF) (N=235)	M SD	47.67 7.99	50.26 10.46	49.22 10.93	50.73 9.57	0.66	NS
Marital satisfaction (KMS) (N=136)	M SD	24.16 20.89	30.38 21.33	32.49 23.57	25.72 19.46	0.89	NS
Parental satisfaction (KPS) (N=212)	M SD	48.35 11.91	49.15 11.20	48.96 11.04	49.85 11.36	0.12	NS

**Note:** Group 1 contained 23 cases where the worst thing reported was severe physical and sexual abuse. Group 2 contained 99 cases where it was severe physical abuse. Group 3 contained 40 cases where it was severe sexual abuse. Group 4 contained 85 cases where it was severe emotional abuse. Participants' statements were classified as severe physical abuse if they reported physical violence, beating, slapping, or being physically injured, but not having medical attention withheld. Statements were classified as severe sexual abuse if the person reported the words sexual abuse or mentioned rape; genital, anal or oral sex; masturbation; or other coercive sexual activities involving either staff or older pupils. Statements were classified as severe physical and sexual abuse if they involved both severe physical abuse and severe sexual abuse as defined earlier. Statements of actions involving humiliation, degradation, severe lack of care, withholding medical treatment, witnessing the traumatization of other pupils and adverse experiences that were not clearly classifiable as severe sexual or physical abuse were classified as severe emotional abuse. Inter-rater agreement greater than 90% was achieved for a sample of 10% of statements. Details of statements are in Table 3.4. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAF=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS means and SDs are based on the number of participants who lived with partners (N=136). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Shectman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). KPS means and SDs are based on the number of participants with children (N=212). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before ANOVAs were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. F values are from one-way analysis of variance and inter-group differences are based on Scheffe post hoc tests for comparing groups with unequal Ns that were significant at p<.05. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

**Table 4.16. Profiles of 4 groups of participants who reported suffering differing types of worst abusive experiences in institutions**

	<b>Group 1 Severe Sexual and Physical Abuse</b>	<b>Group 2 Severe Physical Abuse</b>	<b>Group 3 Severe Sexual Abuse</b>	<b>Group 4 Severe Emotional Abuse</b>
<b>PAST HISTORY &amp; DEMOGRAPHICS</b>				
Few years with family before entry	+	-	<b>0</b>	+
Many years in institution	-	-	<b>0</b>	+
<b>Entry reason</b>				
Through courts for petty crime	-	-	+	<b>0</b>
<b>Institution management</b>				
Nuns	-	-	<b>0</b>	+
Religious brothers & priests	-	-	+	<b>0</b>
Mixed feelings leaving	-	-	<b>0</b>	+
<b>Gender</b>				
Male	-	-	+	<b>0</b>
Female	-	-	<b>0</b>	+
<b>AGE</b>				
Older (60s)	<b>0</b>	+	<b>0</b>	-
Lower educational achievement	<b>0</b>	+	-	<b>0</b>
<b>Parent-child living arrangements</b>				
Children spent time living with other parent	+	-	+	<b>0</b>
Children put up for adoption	-	+	-	-
<b>INSTITUTIONAL ABUSE</b>				
Physical institutional abuse	+	-	-	<b>0</b>
Sexual institutional abuse	+	-	+	-
Worst thing began at an early age	-	-	<b>0</b>	+
Worst thing lasted a long time	-	+	<b>0</b>	+
<b>ADULT PSYCHOLOGICAL ADJUSTMENT</b>				
<b>Psychological disorders</b>				
Posttraumatic stress disorder, current	+	-	+	-
Alcohol & Substance use, lifetime	-	-	+	<b>0</b>
Antisocial personality disorder	-	-	+	<b>0</b>
Multiple trauma symptoms	+	-	+	<b>0</b>
Multiple life problems	-	<b>0</b>	+	<b>0</b>

**Note:** +=the feature was a significant feature of the group profile. 0=the feature was not a significant element of the group profile. - a moderate level of the feature characterized the groups profile.

## Part 5 Profiles of groups with different patterns of psychological disorders

### *Summary of Part 5*

- 3.217** There was an association between having psychological disorders and reporting both institutional and family-based child abuse and neglect. Certain patterns of psychological disorders were associated with institutional abuse alone, and other patterns were associated with institutional family-based child abuse and neglect. For participants with multiple co-morbid diagnoses, and for those with mood disorders, greater institutional, but not family-based physical, sexual and emotional abuse was reported. Participants with PTSD, alcohol and substance use disorders, avoidant and antisocial personality disorder reported both institutional and family-based abuse or neglect. Participants with multiple diagnoses had the poorest adult psychological adjustment and those with no diagnoses were the best adjusted. Subgroups selected by diagnosis showed an intermediate level of adult psychological adjustment between these extremes. What follows are brief profiles of groups with different patterns or types of psychological disorders.
- 3.218** **Multiple comorbid diagnoses.** Participants with 4 or more diagnoses reported greater institutional sexual and emotional abuse (but not more family-based abuse) than participants with fewer diagnoses. Participants with 4 or more diagnoses had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with 1-3 diagnoses, who in turn were less well adjusted than participants with no diagnoses. More participants with 4 or more diagnoses had a fearful adult attachment style, and fewer had secure or dismissive adult attachment styles. On average more participants with 4 or more diagnoses were in their 50s compared with those with no diagnoses who were in their 60s. Also, more participants with 4 or more diagnoses were unemployed and of lower SES than participants with fewer diagnoses.
- 3.219** **Mood disorders.** Participants with mood disorders, more than half of whom had co-morbid anxiety disorders, reported greater institutional sexual and emotional abuse and greater institutional severe physical and sexual abuse (but not family-based child abuse) than participants with no diagnoses. Participants with mood disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. More participants with mood disorders had a fearful adult attachment style, and fewer had a secure adult attachment style. On average participants with mood disorders were in their late 50s while those with no diagnoses were in their 60s. Also, on average, participants with mood disorders had had their first child in their mid-20s, while those with no diagnoses had their first children a couple of years later.
- 3.220** **Posttraumatic stress disorder.** Participants with PTSD, more than half of whom had other co-morbid anxiety disorders and alcohol or substance use disorders, reported greater institutional physical, sexual and emotional abuse, and greater institutional severe physical and sexual abuse than participants with no diagnoses. They also reported having experienced greater family-based emotional abuse. Participants with PTSD had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with no diagnoses. Fewer participants with PTSD had a dismissive adult attachment style. On average participants with PTSD were in their 50s while those with no disorders were in their 60s.
- 3.221** **Alcohol and substance use disorders.** Participants with alcohol and substance use disorders, more than half of whom had a co-morbid anxiety disorder, reported greater institutional sexual and emotional abuse, and greater institutional severe sexual abuse than participants with no diagnoses. They also reported having experienced greater family-based physical and emotional abuse. Participants with alcohol and substance use disorders had more trauma symptoms and



life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. Compared with those with no diagnoses, participants with alcohol and substance use disorders were younger (in their 50s not their 60s); had had their first children at a younger age (in early, not their late 20s); were of lower SES; and fewer had entered an institution because their parents had died.

**3.222 Avoidant personality disorder.** Participants with avoidant personality disorders reported greater institutional and family-based emotional abuse than those with no diagnoses. Almost all participants with an avoidant personality disorder had a co-morbid anxiety, mood or substance use disorder. Participants with avoidant personality disorder had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with no diagnoses. Compared to those with no diagnoses, more participants with an avoidant personality disorder had a fearful adult attachment style and fewer had a secure adult attachment style. Compared to participants with no diagnoses, participants with avoidant personality disorder were younger (in their 50s, not their 60s) and more had been placed in institutions run by nuns because their parents could not care for them.

**3.223 Antisocial personality disorder.** Participants with antisocial personality disorder reported greater institutional sexual abuse than participants with no diagnoses. All participants with antisocial personality disorder had co-morbid anxiety, mood or substance use disorders. Participants with antisocial personality disorder had more trauma symptoms, more life problems, a lower quality of life, a lower global level of functioning, and lower parental satisfaction than participants with no diagnoses. Compared to those with no diagnoses, participants with antisocial personality disorder were younger (in their 50s, not their 60s); had spent fewer years in institutions (5 1/2 not nearly 10 years); more were unemployed; and more were of low SES.

**3.224 Borderline personality disorder.** Participants with borderline personality disorder and those with no diagnoses, did not differ in their reported levels of institutional or family-based child abuse, although both reported a high level of child abuse. All participants with borderline personality disorder had co-morbid anxiety, mood or substance use disorders. Participants with borderline personality disorders had more trauma symptoms, more life problems, a lower quality of life, a lower global level of functioning, and more had a fearful adult attachment style than participants with no diagnoses. Compared to those with no diagnoses, participants with borderline personality disorder were younger (in their 50s, not 60s), more were unemployed, and on average reported being abused from an earlier age.

### ***Introduction***

**3.225** Recollections of both institutional and family-based child abuse by adult survivors of institutional living with varying patterns of psychological disorders are the main focus of this Part. In addition, profiles of subgroups of cases with varying patterns of psychological disorders are presented with respect to their trauma symptoms, life problems, quality of life, global functioning, relationships, adult attachment styles and demographic characteristics. A number of specific questions were addressed:

1. Do adult survivors of institutional living with many co-morbid diagnoses report more institutional and family-based child abuse compared to those with few or no diagnoses and what are the profiles of groups with many, few and no diagnoses?
2. Do adult survivors of institutional living with mood disorders report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with mood disorders?

3. Do adult survivors of institutional living with posttraumatic stress disorder (PTSD) report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with PTSD?
4. Do adult survivors of institutional living with alcohol and substance use disorders report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with alcohol and substance use disorders?
5. Do adult survivors of institutional living with personality disorders report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with personality disorders?

### ***Statistical analysis strategy***

**3.226** The results of analyses conducted to address these questions will be presented in five sections, corresponding to the five questions. There are sections on multiple disorders, mood disorders, PTSD, substance use disorders and personality disorders. In answering the questions addressed in this Part, the following strategy was used in all statistical analyses. For categorical variables, chi square tests were conducted with p values set conservatively at  $p < .01$  to reduce the probability of type 1 error (misinterpreting spurious group differences as significant). Where chi square tests were significant at  $p < .01$ , group differences were interpreted as significant if standardised residuals in table cells exceeded an absolute value of 2. For continuous variables, to control for type 1 error, where possible multivariate analyses of variance (MANOVAs) were conducted on groups of conceptually related variables. Where MANOVAs were significant at  $p < .05$ , specific variables on which groups differed at a significance level of  $p < .01$  were identified by conducting one-way analyses of variance (ANOVAs) or t-tests. t-tests were used where only two groups were compared and ANOVAs were used where comparisons involved more than two groups. Scheffe post-hoc comparison tests for designs with unequal cell sizes were conducted to identify significant intergroup differences in those instances where ANOVAs yielded significant F values. Dunnett's test was used instead of Scheffe's, where the assumption of homogeneity of variance was violated. In addition to these parametric analyses of continuous variables, in those instances where dependent variables were not normally distributed, non-parametric Kruskal Wallance (for 3 groups) or Mann Whitney (for two groups) tests were conducted as well as ANOVAs. If these non-parametric tests yielded results that differed from those of the ANOVAs, these were reported. For continuous variables where MANOVAs were not conducted, because there were no grounds for conceptually grouping variables, to control for type 1 error, t-tests or ANOVAs were interpreted as statistically significant if  $p < .01$ . For the TSI and the WHOQOL, which are multiscale instruments, unless the pattern of subscale scores differed greatly from that of total scores, for brevity, only analyses of total scores are reported. To facilitate interpretation of profiles of tabulated means, all psychological variables on continuous scales were transformed to T-scores (with means of 50 and standard deviations of 10) before analyses were conducted. T-score for variable X =  $((X - M) / SD) \times 10 + 50$ , where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X.

### ***Multiple co-morbid psychological diagnoses***

**3.227** In this section results are presented of analyses which address the question: Do adult survivors of institutional living, with many co-morbid diagnoses report more institutional and family-based child abuse compared to those with few or no diagnoses and what are the profiles of groups with many, few and no diagnoses? To address this question cases were classified into three groups. Group 1 contained 83 cases with four or more current or lifetime diagnoses as assessed with the SCID I and SCID II, while none of the 45 cases in group 3 had any current or lifetime diagnoses. 119 participants with 1 to 3 current or lifetime diagnoses were assigned to group 2.

**3.228** From Table 5.1. it may be seen that compared with groups 2 and 3, group 1 obtained significantly higher mean scores on the IAS; the total, sexual and emotional abuse scales of the institutional



version of the CTQ; and on the total and sexual severe abuse scales of the institutional version of the SPSA.

**3.229** The MANOVA for the scales and subscales of the family versions of the CTQ and SPSA was not significant, so it was concluded that there were no significant differences between scores of the three groups on family versions of the CTQ or SPSA.

**3.230** From Table 5.2 it may be seen that for the total number of Trauma symptoms on the TSI and the total number of life problems on the LPC, the mean scores for group 1 were significantly higher than those of group 2, which in turn were significantly higher than those of group 3. For the total score on the WHOQOL and the GAF, the mean scores for group 1 were significantly lower than those of group 2, which in turn were significantly lower than those of group 3. These results show that, participants with 4 or more diagnoses had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with 1-3 diagnoses, who in turn were less well adjusted than participants with no diagnoses.

**3.231** From Table 5.3 it may be seen that on the ECRI compared with groups 2 and 3, significantly more members of group 1 had a fearful adult attachment style, and significantly fewer had secure or dismissive adult attachment styles.

**3.232** On demographic variables, significant group differences occurred for age (Group 1: M= 57.64; Group 2: M = 60.37; Group 3: = 63.67;  $F(2, 244) = 8.26, p < .001$ ; Group 3 > Group 1); currently unemployed (Group 1: 36.4%; Group 2: 22.7%; Group 3: 11.10%; Chi Square (8, N=247) = 20.62,  $p < .01$ ; Group 1 > Group 2 & Group 3); achieving a skilled manual SES level (Group 1: 7.79%; Group 2: 12.39%; Group 3: 24.44%; Chi Square (8, N=247) = 20.37,  $p < .01$ ; Group 3 > Group 1 & Group 2); and achieving a lower professional or managerial SES level (Group 1: 6.49%; Group 2: 19.47%; Group 3: 24.44%; Chi Square (8, N=247) = 20.37,  $p < .01$ ; Group 1 < Group 2 & Group 3). These results show that group 1 was younger than group 3; more members of group 1 were unemployed; and their highest achieved SES level was lower than that of the other two groups.

**3.233** **Summary.** Participants with 4 or more diagnoses, reported greater institutional sexual and emotional abuse than participants with fewer diagnoses. However, those with 4 or more diagnoses did not report experiencing more family-based child abuse or neglect. Participants with 4 or more diagnoses had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with 1-3 diagnoses, who in turn were less well adjusted than participants with no diagnoses. More participants with 4 or more diagnoses had a fearful adult attachment style, and fewer had secure or dismissive adult attachment styles. On average more participants with 4 or more diagnoses were in their 50s compared with those with no diagnoses who were in their 60s. Also, more participants with 4 or more diagnoses were unemployed and of lower SES than participants with fewer diagnoses.

### ***Mood disorders***

**3.234** In this section results are presented of analyses which address the question: Do adult survivors of institutional living with mood disorders report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with mood disorders? To address this question 142 cases with a diagnosis of lifetime or current major depression or current dysthymia were compared with those with no current or lifetime anxiety, mood, substance use or personality disorders. Among the 142 participants with mood disorders, comorbid disorders were common. More than half (57%) had a current anxiety disorder; 44% had a current or lifetime alcohol and substance use disorder; and 38% had a personality disorder.

- 3.235** From Table 5.4 it may be seen that compared with group 2, group 1 obtained significantly higher mean scores on the total, sexual and emotional abuse scales of the institution version of the CTQ, and on the total, physical and sexual severe abuse scales of the institutional version of the SPSA. The MANOVA for the scales and subscales of the family versions of the CTQ and SPSA was not significant, so it was concluded that there were no significant differences between scores of the three groups on family versions of the CTQ or SPSA.
- 3.236** From Table 5.5 it may be seen that for the total number of Trauma symptoms on the TSI and the total number of life problems on the LPC, the mean scores for group 1 were significantly higher than those of group 2. For the total score on the WHOQOL and the GAF, the mean scores for group 1 were significantly lower than those of group 2. These results show that participants with mood disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses.
- 3.237** From Table 5.6 it may be seen that on the ECRI compared with group 2, significantly more members of group 1 had a fearful adult attachment style, and significantly fewer had a secure adult attachment style.
- 3.238** On demographic variables, significant group differences occurred for age (Group 1 M= 59.18, Group 2 M = 63.67,  $t(245) = 3.19$ ,  $p < .01$ ), and age when first child was born (Group 1 M= 24.90, Group 2 M = 27.71,  $t(159) = 2.69$ ,  $p < .01$ ). These results show that on average participants in group 1 were in their late 50s, while those in group 2 were in their 60s. Also, on average participants in group 1 had their first child in their mid-20s, while those in group 2 had their first children a couple of years later.
- 3.239** **Summary.** Participants with mood disorders, more than half of whom had co-morbid anxiety disorders, reported greater institutional sexual and emotional abuse; and greater institutional severe physical and sexual abuse than participants with no diagnoses. However, those with mood disorders did not report experiencing more family-based child abuse or neglect. Participants with mood disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. More participants with mood disorders had a fearful adult attachment style, and fewer had a secure adult attachment style. On average participants with mood disorders were in their late 50s while those with no diagnoses were in their 60s. Also, on average participants with mood disorders had had their first child in their mid-20s, while those with no diagnoses had their first children a couple of years later.

### **Posttraumatic stress disorder**

- 3.240** In this section results are presented of analyses which address the question: Do adult survivors of institutional living with posttraumatic stress disorder (PTSD) report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with PTSD? To address this question 63 cases with a diagnosis of lifetime or current PTSD were compared with 45 cases with no current or lifetime mood, anxiety, substance use or personality disorders. Among the 63 participants with PTSD comorbid disorders were common. More than three quarters (77%) had another current anxiety disorder; 55% had a lifetime diagnosis of any anxiety disorder; 50% had a lifetime diagnosis of alcohol and substance use disorder; 47% had a lifetime diagnosis of a mood disorder; and 41% had a personality disorder.
- 3.241** From Table 5.7 it may be seen that compared with group 2, group 1 obtained significantly higher mean scores on the IAS; the total, physical, sexual and emotional abuse scales of the institution version of the CTQ; and on the total, physical and sexual severe abuse scales of the institutional version of the SPSA. Compared with group 2, group 1 also obtained significantly higher mean scores on the emotional abuse scale of the family version of the CTQ and the total scale of the

family version of the SPSA. However, cautious interpretation of scores from the family version of the SPSA is warranted because of the low reliability of the total and physical severe abuse scores from this instrument, mentioned in Part 3 and documented in Table 3.11.

**3.242** From Table 5.8 it may be seen that for the total number of Trauma symptoms on the TSI and the total number of life problems on the LPC, the mean scores for group 1 were significantly higher than those of group 2. For the total score on the WHOQOL and the GAF, the mean scores for group 1 were significantly lower than those of group 2. These results show that participants with PTSD disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses.

**3.243** From Table 5.9 it may be seen that on the ECRI compared with group 2, significantly fewer members of group 1 had a dismissive adult attachment style.

**3.244** The only demographic variable on which the groups differed significantly was age (Group 1 M = 57.49, Group 2 M = 63.67,  $t(106) = 3.97, p < .01$ ). On average participants with PTSD were in their 50s, while those with no diagnoses were in their 60s.

**3.245** **Summary.** Participants with PTSD, more than half of whom had other co-morbid anxiety disorders and alcohol or substance use disorders, reported greater institutional physical, sexual and emotional abuse; and greater institutional severe physical and sexual abuse than participants with no diagnoses. They also reported having experienced greater family-based emotional abuse. Participants with PTSD had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. Fewer participants with PTSD had a dismissive adult attachment style. On average participants with PTSD were in their 50s while those with no disorders were in their 60s.

### ***Substance abuse***

**3.246** In this section, results are presented of analyses which address the question: Do adult survivors of institutional living with alcohol and substance use disorders report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with alcohol and substance use disorders? To address this question 99 cases with a current or lifetime diagnosis of an alcohol or substance use disorder were compared with 45 cases with no diagnosis. Among the 99 participants with alcohol or substance use disorders, comorbid disorders were common. More than half (54%) had a current anxiety disorder, 48% had a lifetime diagnosis of any anxiety disorder, 39% had a current or lifetime diagnosis of a mood disorder, and 39% had a personality disorder.

**3.247** From Table 5.10 it may be seen that compared with group 2, group 1 obtained significantly higher mean scores on the IAS; the total, sexual and emotional abuse scales of the institution version of the CTQ; and the total and sexual severe abuse scales of the institutional version of the SPSA. Compared with group 2, group 1 obtained significantly higher mean scores on the physical and emotional abuse scales of the family version of the CTQ, and on the total scale of the family version of the SPSA. However, cautious interpretation of scores from the family version of the SPSA is warranted because of the low reliability of the total and physical severe abuse scores from this instrument, mentioned in Part 3 and documented in Table 3.11.

**3.248** From Table 5.11 it may be seen that for the total number of Trauma symptoms on the TSI and the total number of life problems on the LPC, the mean scores for group 1 were significantly higher than those of group 2. For the total score on the WHOQOL and the GAF, the mean scores for group 1 were significantly lower than those of group 2. These results show that participants

with alcohol and substance use disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses.

**3.249** With respect to demographic and historical variables the groups differed significantly on age (Group 1:  $M = 58.25$ , Group 2:  $M = 63.67$ ,  $t(106) = 3.94$ ,  $p < .01$ ); age when first child was born (Group 1  $M = 24.73$ , Group 2  $M = 27.71$ ,  $t(142) = 2.80$ ,  $p < .01$ ); current membership of an SES group of skilled manual work or higher (Group 1: 6.30%, Group 2: 22.20%, Chi Square (4,  $N = 144$ ) = 15.37,  $p < .001$ ); membership of an SES group higher than skilled manual work since leaving school (Group 1: 4.40%, Group 2: 24.40%, Chi Square (4,  $N = 144$ ) = 22.80,  $p < .0001$ ); and entering an institution because their parents died (Group 1: 8.20%, Group 2: 25.60%, Chi Square (3,  $N = 144$ ) = 15.01,  $p < .01$ ). These results show that compared with group 2, participants in group 1 were in their 50s (not their 60s); had had their first children in their early 20s (not their late 20s); were of lower SES; and fewer had entered an institution because their parents had died.

**3.250** **Summary.** Participants with alcohol and substance use disorders, more than half of whom had a co-morbid anxiety disorder, reported greater institutional sexual and emotional abuse; and greater institutional severe sexual abuse than participants with no diagnoses. They also reported having experienced greater family-based physical and emotional abuse. Participants with alcohol and substance use disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. Compared with those with no diagnoses, participants with alcohol and substance use disorders were younger (in their 50s not their 60s); had had their first children in their earlier (in early, not their late 20s); were of lower SES; and fewer had entered an institution because their parents had died.

### ***Personality disorders***

**3.251** In this section results are presented of analyses which address the question: Do adult survivors of institutional living with personality disorders report more institutional and family-based child abuse compared to those with no diagnoses and what is the profile of participants with personality disorders? A series of analyses were conducted to address this question in which cases with personality disorders were compared with cases with no diagnoses. 75 participants had a personality disorder; 52 had avoidant personality disorder; 17 had antisocial personality disorder; 14 had borderline personality disorder; and 4 had dependent personality disorder. 9 cases had two or more comorbid personality disorders. In the three larger groups, there were 48 with avoidant personality disorder only; 10 with antisocial personality disorder only; and 6 with borderline personality disorder only. In view of this pattern of single and co-morbid personality disorder diagnoses, it was decided that cell sizes would be too small to validly compare profiles of three largest groups with distinct personality disorders. Instead, three separate analyses were conducted. In the first of these, 52 cases with avoidant personality disorder were compared with 45 cases with no diagnosis. In the second, 17 cases with antisocial personality disorder were compared with 45 cases with no diagnosis. In the third, 14 cases with borderline personality disorder were compared with 45 cases with no diagnosis.

### ***Avoidant personality disorder***

**3.252** From Table 5.12 it may be seen that compared with group 2, group 1 obtained significantly higher mean scores on the emotional abuse scale of the institution and family versions of the CTQ.

**3.253** Among the 52 cases with avoidant personality disorder, comorbid disorders were common. Almost all cases (98%) had a co-morbid anxiety, mood or substance use disorder. Just over three quarters (78.8%) had a current anxiety disorder. Just over half had a current mood disorder (53.8%). And just over a third (36.5%) had a lifetime diagnosis of a substance use disorder.

**3.254** From Table 5.13 it may be seen that for the total number of Trauma symptoms on the TSI and the total number of life problems on the LPC, the mean scores for group 1 were significantly higher than those of group 2. For the total score on the WHOQOL and the GAF, the mean scores for group 1 were significantly lower than those of group 2. These results show that participants with avoidant personality disorder had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses.

**3.255** From Table 5.14 it may be seen that on the ECRI compared with group 2, significantly more members of group 1 had a fearful adult attachment style and significantly fewer members of group 1 had a secure adult attachment style.

**3.256** With respect to demographic and historical variables, the groups differed significantly on age (Group 1:  $M = 57.90$ , Group 2:  $M = 63.67$ ,  $t(95) = 2.31$ ,  $p < .01$ ); being placed in an institution because their parents could not provide care (Group 1: 64.00%, Group 2: 20.93%, Chi Square (3,  $N=97$ ) = 18.08,  $p < .0001$ ); and placement in an institution run by nuns (Group 1: 61.5%, Group 2: 42.2%, Chi Square (2,  $N=97$ ) = 11.41,  $p < .01$ ). These results show that compared with group 2, participants in group 1 were in their 50s (not their 60s); more had been placed in an institution because their parents could not care for them; and more were placed in an institution run by nuns.

**3.257** Summary. Participants with avoidant personality disorders reported greater institutional and family-based emotional abuse than those with no diagnoses. Almost all participants with an avoidant personality disorder had a co-morbid anxiety, mood or substance use disorder. Participants with avoidant personality disorder had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. Compared to those with no diagnoses, more participants with an avoidant personality disorder had a fearful adult attachment style and fewer had a secure adult attachment style. Compared to participants with no diagnoses, participants with avoidant personality disorder were younger (in their 50s, not their 60s) and more had been placed in institutions run by nuns because their parents could not care for them.

### **Antisocial personality disorder**

**3.258** From Table 5.15 it may be seen that compared with group 2, group 1 obtained significantly higher mean scores on the total and sexual abuse scales of the institution version of the CTQ, and on the severe sexual abuse scale of the institution version of the SPSA.

**3.259** All 17 participants with antisocial personality disorder had co-morbid anxiety, mood or substance use disorders. Just over three quarters (76.5%) had a lifetime diagnosis of substance use disorder. 70% had a current anxiety disorder and 64% had a lifetime diagnosis of an anxiety disorder. 41% had had a mood disorder at some point in their life. Just over a third (35.3%) had comorbid borderline personality disorder.

**3.260** From Table 5.16 it may be seen that for the total number of Trauma symptoms on the TSI and the total number of life problems on the LPC, the mean scores for group 1 were significantly higher than those of group 2. For the total score on the WHOQOL, the GAF, and the KPS the mean scores for group 1 were significantly lower than those of group 2. These results show that participants with antisocial personality disorder had more trauma symptoms and life problems; and a lower quality of life, global level of functioning, and parental satisfaction than participants with no diagnoses.

**3.261** With respect to demographic variables, the groups differed on age (Group 1:  $M = 57.24$ , Group 2:  $M = 63.67$ ,  $t(60) = 2.98$ ,  $p < .01$ ); number of years spent in an institution (Group 1:  $M = 5.56$ , Group 2:  $M = 9.86$ ,  $t(60) = 3.28$ ,  $p < .01$ ); currently unemployed (Group 1: 56.30%, Group 2: 11.10%, Chi



Square (4, N=62) = 15.17,  $p < .01$ ); and membership of a higher SES group than skilled workers since leaving school (Group 1: 0%, Group 2: 24.44%, Chi Square (3, N=62) = 11.45,  $p < .01$ ). These results show that compared to those with no diagnoses, participants with antisocial personality disorder were younger (in their 50s, not their 60s); had spent fewer years in institutions (five and a half, not nearly 10 years); more were unemployed; and more were of low SES.

**3.262 Summary.** Participants with antisocial personality disorder reported greater institutional sexual abuse than participants with no diagnoses. All participants with antisocial personality disorder had co-morbid anxiety, mood or substance use disorders. Participants with antisocial personality disorder had more trauma symptoms, more life problems, a lower quality of life, a lower global level of functioning, and lower parental satisfaction than participants with no diagnoses. Compared to those with no diagnoses, participants with antisocial personality disorder were younger (in their 50s, not their 60s); had spent fewer years in institutions (5 1/2 not nearly 10 years); more were unemployed; and more were of low SES.

### **Borderline personality disorder**

**3.263** When the significance of differences between scores of participants with borderline personality disorder and no diagnoses was evaluated with MANOVA on indices of both institutional and family-based child abuse, the two groups were found not to differ significantly. The MANOVA on all subscales of the institution versions of the IAS, CTQ, and SPSA was not significant nor was the MANOVA on all subscales of the family versions of the CTQ and SPSA. These results showed that participants with borderline personality disorder and those with no diagnoses, did differ in their reported levels of institutional or family-based child abuse.

**3.264** All 14 cases of borderline personality disorder had co-morbid anxiety, mood or substance use disorders. Just over three quarters (78.6%) had a current diagnosis of an anxiety disorder. Just over three quarters (78.0%) had a current diagnosis of a mood disorder and half had a lifetime diagnosis of a substance use disorder. 42.9% had comorbid antisocial personality disorder.

**3.265** From Table 5.17 it may be seen that for the total number of trauma symptoms on the TSI and the total number of life problems on the LPC, the mean scores for group 1 were significantly higher than those of group 2. For the total score on the WHOQOL and the GAF, the mean scores for group 1 were significantly lower than those of group 2. These results show that participants with borderline personality disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses.

**3.266** From Table 5.18 it may be seen that on the ECRI compared with group 2, significantly more members of group 1 had a fearful adult attachment style.

**3.267** With respect to demographic and historical variables, the groups differed on age (Group 1:  $M = 54.54$ , Group 2:  $M = 63.67$ ,  $t(57) = 3.93$ ,  $p < .0001$ ); current unemployment (Group 1: 53.80%, Group 2: 11.10%, Chi Square (4, N=59) = 19.22,  $p < .01$ ); and the age when the worst form of abuse began (Group 1:  $M = 7.04$ , Group 2:  $M = 10.42$ ,  $t(57) = 3.06$ ,  $p < .01$ ). Compared to those with no diagnoses, participants with borderline personality disorder were younger (in their 50s, not 60s), more were unemployed, and on average reported being abused from an earlier age (from about 7, not 10 years).

**3.268 Summary.** Participants with borderline personality disorder and those with no diagnoses, did not differ in their reported levels of institutional or family-based child abuse, although both reported a high level of child abuse. All participants with borderline personality disorder had co-morbid anxiety, mood or substance use disorders. Participants with borderline personality disorders had more trauma symptoms, more life problems, a lower quality of life, a lower global level of

functioning, and more had a fearful adult attachment style than participants with no diagnoses. Compared to those with no diagnoses, participants with borderline personality disorder were younger (in their 50s, not 60s), more were unemployed, and on average reported being abused from an earlier age.

### **Conclusions**

- 3.269** Table 5.19 summarizes patterns of institutional and family-based child abuse and neglect reported by participants with multiple co-morbid diagnoses, mood disorders, PTSD, substance use disorders, and personality disorders. The table also profiles the adult psychological adjustment of participants in each of these groups.
- 3.270** The first main conclusion that can be drawn from the table is that there was an association between having psychological disorders and reporting both institutional and family-based child abuse and neglect.
- 3.271** The second conclusion is that certain patterns of psychological disorders were associated with institutional abuse alone, and other patterns were associated with institutional and family-based child abuse and neglect. For participants with multiple co-morbid diagnoses and mood disorders, greater institutional, but not family-based physical, sexual and emotional abuse was reported. Participants with PTSD, alcohol and substance use disorders, avoidant and antisocial personality disorder reported both institutional and family-based abuse or neglect.
- 3.272** A remarkable finding, in this context, was that participants with borderline personality disorder reported similar levels of abuse to participants with no diagnosis, since the link between child abuse and personality disorder is well established. It should be emphasized that normatively the group with no diagnosis had experienced significant abuse, and the profile of the borderline personality disorder group (along with all other profiles in Table 5.19) is relative to the group with no diagnosis, not to a normal control group.
- 3.273** The third main finding was that participants with multiple diagnoses had the poorest adult psychological adjustment and those with no diagnoses were the best adjusted. Subgroups selected by diagnosis showed an intermediate level of adult psychological adjustment between these extremes.

Table 5.1. Recollections of child abuse among participants with 4 or more diagnoses, 1-3 diagnoses and no diagnoses

Variable		Group 1 4+ Diagnoses N=83	Group 2 1-3 Diagnoses N=119	Group 3 0 Diagnoses N=45	ANOVA F	Group Diff
<b>INSTITUTIONAL ABUSE</b> IAS (N=247)	Specific institutional abuse	M SD 52.89 9.65	49.01 9.91	47.28 9.80	5.96**	1>2,3
	Total institutional abuse	M SD 54.04 9.37	48.38 9.37	46.83 10.58	11.51***	1>2,3
<b>CTQ-Institution (N=247)</b>	Physical abuse	M SD 52.06 9.66	49.06 10.21	48.67 9.66	2.73	NS
	Sexual abuse	M SD 53.69 11.25	48.23 8.92	47.92 8.42	9.06***	1>2,3
<b>Emotional abuse</b>	Emotional abuse	M SD 53.46 7.46	49.32 9.75	45.43 12.48	10.73***	1>2,3
	Physical neglect	M SD 51.23 9.07	49.06 10.40	50.14 10.55	1.16	NS
<b>Emotional neglect</b>	Emotional neglect	M SD 51.21 9.90	49.73 10.09	48.51 9.98	1.14	NS
	Total severe institutional abuse	M SD 51.87 6.50	49.43 5.41	48.07 5.03	7.55**	1>2,3
<b>SPSA-Institution (N=247)</b>	Severe institutional physical abuse	M SD 51.87 10.74	49.81 9.69	46.97 8.66	3.62	NS
	Severe institutional sexual abuse	M SD 52.78 10.48	48.85 9.74	47.85 8.66	5.23**	1>2,3



Variable		Group 1 4+ Diagnoses N=83	Group 2 1-3 Diagnoses N=119	Group 3 0 Diagnoses N=45	ANOVA F	Group Diff
<b>CHILD ABUSE IN FAMILY</b> CTQ-family (N=121)	Total family abuse score	M SD 50.46 9.66	51.31 11.56	46.31 5.52		NS
	Physical abuse	M SD 51.20 10.49	50.63 10.80	46.37 5.88		NS
	Sexual abuse	M SD 48.58 5.48	52.47 14.15	47.44 1.91		NS
	Emotional abuse	M SD 50.90 10.55	51.30 10.95	45.49 4.10		NS
	Physical neglect	M SD 50.60 10.32	49.66 10.17	49.57 9.34		NS
	Emotional neglect	M SD 50.28 10.72	50.72 10.24	47.91 7.97		NS
	Total severe family abuse	M SD 50.82 8.78	50.99 11.94	46.37 6.64		NS
	Severe family physical abuse	M SD 51.87 10.37	49.88 10.18	46.65 8.24		NS
	Severe family sexual abuse	M SD 48.39 5.44	52.46 13.99	47.77 3.91		NS
<b>SPSA-family (N=121)</b>						

**Note:** Group 1 had four or more current or lifetime diagnoses as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press) and SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders, (SCID-II)*. Washington, DC: American Psychiatric Press). Group 2 had 1-3 current or lifetime diagnoses. Group 3 had no diagnoses. CTQ=Childhood Trauma Questionnaire (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse. To aid profiling, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before ANOVAs were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. F values are from one-way analyses of variance and inter-group differences are based on Scheffe post hoc tests for comparing groups with unequal Ns that were significant at p<.05. For the MANOVA on all subscales of the institution versions of the CTQ, SPSA & the IAS, F (14, 476) = 2.89, p<0.0001. For the MANOVA on all subscales of the family versions of the CTQ and SPSA, F (12, 226) = 1.30, NS. \*\*\*p<0.001. NS=Not significant.

Table 5.2. Current adjustment of participants with 4 or more diagnoses, 1-3 diagnoses and no diagnoses

		Group 1 4+ Diagnoses N=83	Group 2 1-3 Diagnoses N=119	Group 3 0 Diagnoses N=45	ANOVA F	Group Diff
Total trauma symptoms (TSI) (N=247)	M SD	57.74 7.89	48.51 8.21	39.66 5.83	84.28***	1>2>3
Total No of life problems (LPC) (N=247)	M SD	55.73 10.30	48.27 8.93	43.99 6.30	28.92***	1>2>3
Total quality of life (WHOQOL) (N=247)	M SD	42.74 8.69	52.12 8.45	57.79 7.32	54.86***	1<2<3
Global functioning (GAF) (N=235)	M SD	42.98 9.39	51.40 8.00	58.87 6.44	56.43***	1<2<3
Marital satisfaction (KMS) (N=136)	M SD	50.56 9.98	51.62 10.90	53.51 10.26	0.68	NS
Parental satisfaction (KPS) (N=212)	M SD	47.33 11.61	50.70 10.21	49.43 12.59	1.93	NS

**Note:** Group1 had four or more current or lifetime diagnoses as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press) and SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders. (SCID-II)*. Washington, DC: American Psychiatric Press). Group 2 had 1-3 current or lifetime diagnoses. Group 3 had no diagnoses. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAF=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417), KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Sheckman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before ANOVAs were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. F values are from one-way analysis of variance and inter-group differences are based on Scheffe post hoc tests for comparing groups with unequal Ns that were significant at p<.05. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

**Table 5.3. Adult attachment styles of participants with 4 or more diagnoses, 1-3 diagnoses and no diagnoses**

Adult Attachment Style		Group 1 4+ Diagnoses  N= 83	Group 2 1-3 Diagnoses  N= 119	Group 3 0 Diagnoses  N=45	Group Differences
Secure	f	6.00	22.00	13.00	1<2<3
	%	7.20	18.50	28.90	
Dismissive	f	10.00	39.00	17.00	1<2,3
	%	12.00	32.80	37.80	
Fearful	f	54.00	43.00	12.00	1>2,3
	%	65.10	36.10	26.70	
Preoccupied	f	13.00	15.00	3.00	NS
	%	15.70	12.60	6.70	

**Note:** Group1 had four or more current or lifetime diagnoses as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press) and SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders, (SCID-II)*. Washington, DC: American Psychiatric Press). Group 2 had 1-3 current or lifetime diagnoses. Group 3 had no diagnoses. Cases were classified into the four adult attachment styles using the SPSS algorithm for the Experiences in Close Relationships Inventory in Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press. Chi Square (6, N=247) =34.07, p<.001. Within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. Group differences were interpreted as significant where cell standardised residuals equalled or exceeded an absolute value of 2.00.

Table 5.4. Recollections of child abuse among participants with mood disorders and no diagnoses

Variable		Group 1 Mood Disorder N=142	Group 2 No Diagnosis N=45	t	Group Diff
<b>INSTITUTIONAL ABUSE</b> IAS (N=187)	Specific institutional abuse	M SD 51.49 9.87	47.28 9.80	2.50	NS
	Total institutional abuse	M SD 52.01 9.95	46.83 10.58	3.00**	1>2
<b>CTQ- Institution (N=187)</b>	Physical abuse	M SD 51.04 10.32	48.67 9.66	1.37	NS
	Sexual abuse	M SD 52.07 10.45	47.92 8.42	2.71**	1>2
<b>SPSA-Institution (N=187)</b>	Emotional abuse	M SD 51.64 8.97	45.43 12.48	3.10**	1>2
	Physical neglect	M SD 50.59 10.16	50.14 10.55	0.26	NS
<b>CHILD ABUSE IN FAMILY</b>	Emotional neglect	M SD 50.23 10.18	48.51 9.98	0.99	NS
	Total severe institutional abuse	M SD 51.21 6.03	48.07 5.03	3.16**	1>2
<b>CHILD ABUSE IN FAMILY</b>	Severe institutional physical abuse	M SD 50.72 9.91	46.97 8.06	2.28**	1>2
	Severe institutional sexual abuse	M SD 52.14 10.22	47.85 8.66	2.77**	1>2

Variable		Group 1 Mood Disorder N=142	Group 2 No Diagnosis N=45	t	Group Diff
<b>CTQ-family (N=92)</b>	<b>Total family abuse score</b>	M SD	46.31 5.52		NS
	<b>Physical abuse</b>	M SD	46.37 5.88		NS
	<b>Sexual abuse</b>	M SD	47.44 1.91		NS
	<b>Emotional abuse</b>	M SD	45.49 4.10		NS
	<b>Physical neglect</b>	M SD	49.57 9.34		NS
	<b>Emotional neglect</b>	M SD	47.91 7.97		NS
	<b>Total severe family abuse</b>	M SD	46.37 6.64		NS
<b>SPSA-family (N=92)</b>	<b>Severe family physical abuse</b>	M SD	46.65 8.24		NS
	<b>Severe family sexual abuse</b>	M	47.77 3.91		NS

**Note:** Group1 had current or lifetime mood disorder diagnoses as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*; Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. CTQ=Childhood Trauma Questionnaire (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse. To aid profiling, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X =  $(X-M)/(SD) \times 10 + 50$ , where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. For the MANOVA on the total scores of the institution versions of the CTQ, SPSA & the IAS,  $F(3, 183) = 4.22, p < 0.01$ . For the MANOVA on total scores of the family versions of the CTQ and SPSA,  $F(2, 89) = 2.65, NS, **p < 0.01, ***p < 0.001, NS = Not significant$ .

Table 5.5. Current adjustment of participants with mood disorders and no diagnoses

		Group 1 Mood Disorder N=142	Group 2 No Diagnosis N=45	t-value	Group Diff
<b>Total trauma symptoms (TSI) (N=187)</b>	M SD	53.77 9.09	39.66 5.83	12.19***	1>2
<b>Total No of life problems (LPC) (N=187)</b>	M SD	52.37 9.80	43.99 6.60	6.71***	1>2
<b>Total quality of life (WHOQOL) (N=187)</b>	M SD	46.21 9.35	57.79 7.32	8.61***	1<2
<b>Global functioning (GAF) (N=180)</b>	M SD	46.78 9.77	58.88 6.44	7.76***	1<2
<b>Marital satisfaction (KMS) (N=99)</b>	M SD	50.09 10.64	53.51 10.26	1.47	NS
<b>Parental satisfaction (KPS) (N=159)</b>	M SD	48.49 10.45	51.50 9.03	1.58	NS

**Note:** Group1 had current or lifetime mood disorders as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*, Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAS=Global assessment of functioning scale (Luborsky, L. (1962). *Clinicians' Judgements of Mental Health. Archives of General Psychiatry*, 7, 407-417). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Shectman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X; t values are from t-tests for independent samples. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

**Table 5.6. Adult attachment styles of participants with mood disorders and no diagnoses Table 5.6.  
Adult attachment styles of participants with mood disorders and no diagnoses**

<b>Adult Attachment Style</b>		<b>Group 1 Mood Disorder  N=142</b>	<b>Group 2 No Diagnosis  N=45</b>	<b>Group Diffs</b>
<b>Secure</b>	f	14.00	13.00	1<2
	%	9.90	28.90	
<b>Fearful</b>	f	76.00	12.00	1>2
	%	53.50	26.70	
<b>Preoccupied</b>	f	19.00	3.00	NS
	%	13.40	6.70	
<b>Dismissive</b>	f	33.00	17.00	NS
	%	23.20	37.80	

**Note:** Group1 had current or lifetime mood disorders as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. Cases were classified into the four adult attachment styles using the SPSS algorithm for the Experiences in Close Relationships Inventory in Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press. Chi Square (3, N=187) =17.82, p<.001. Within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. Group differences were interpreted as significant where cell standardised residuals equalled or exceeded an absolute value of 2.00.

Table 5.7. Recollections of child abuse among participants with PTSD and no diagnoses

Variable		Group 1 PTSD N=63	Group 2 No Diagnosis N=45	t	Group Diff
<b>INSTITUTIONAL ABUSE</b> IAS (N=108)	Specific institutional abuse	M SD 52.23 8.88	47.28 9.80	2.74***	1>2
	Total institutional abuse	M SD 55.47 8.92	46.83 10.58	4.59***	1>2
<b>CTQ-Institution (N=108)</b>	Physical abuse	M SD 54.46 7.86	48.67 9.66	3.47**	1>2
	Sexual abuse	M SD 54.61 11.18	47.92 8.42	3.55**	1>2
<b>SPSA-Institution (N=108)</b>	Emotional abuse	M SD 53.46 6.95	45.43 12.48	3.91***	1>2
	Physical neglect	M SD 51.58 9.97	50.14 10.55	0.72	NS
<b>SPSA-Institution (N=108)</b>	Emotional neglect	M SD 52.12 10.14	48.51 9.98	1.83	NS
	Total severe institutional abuse	M SD 52.87 6.12	48.07 5.03	4.32***	1>2
<b>SPSA-Institution (N=108)</b>	Severe institutional physical abuse	M SD 52.80 9.54	46.97 8.06	3.25**	1>2
	Severe institutional sexual abuse	M SD 54.33 10.40	47.85 8.66	3.42**	1>2



Variable		Group 1 PTSD N=63	Group 2 No Diagnosis N=45	t	Group Diff
<b>CHILD ABUSE IN FAMILY</b> CTQ-family (N=57)	Total family abuse score	M 51.53 9.75	46.31 5.52	2.56	NS
	Physical abuse	M 51.93 10.06	46.37 5.88	2.62	NS
	Sexual abuse	M 50.31 10.02	47.44 1.91	1.61	NS
	Emotional abuse	M 51.48 10.54	45.49 4.10	2.97**	1>2
	Physical neglect	M 51.02 11.47	49.57 9.34	0.51	NS
	Emotional neglect	M 51.46 11.31	47.91 7.97	1.39	NS
	Total severe family abuse	M 52.67 10.03	46.37 6.64	2.85**	1>2
<b>SPSA-family (N=57)</b>	Severe family physical abuse	M 53.32 10.74	46.65 8.24	2.65	NS
	Severe family sexual abuse	M 49.99 8.71	47.77 3.91	1.30	NS

**Note:** Group1 had current or lifetime PTSD diagnoses as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. CTQ=Childhood Trauma Questionnaire (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse. To aid profiling, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = (X-M)/SD(X10)+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. For the MANOVA on the total scores of the institution versions of the CTQ, SPSA & the IAS, F (3, 104) = 8.04, p<0.001. For the MANOVA on total scores of the family versions of the CTQ and SPSA, F (2, 54) = 3.84, p<0.05. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

**Table 5.8. Current adjustment of participants with PTSD and no diagnoses**

		<b>Group 1 PTSD N=63</b>	<b>Group 2 No Diagnosis N=45</b>	<b>t-value</b>	<b>Group Diff</b>
<b>Total trauma symptoms (TSI) (N=108)</b>	M SD	55.32 8.48	39.66 5.83	11.37***	1>2
<b>Total No of life problems (LPC) (N=108)</b>	M SD	52.63 5.28	43.99 6.30	5.28***	1>2
<b>Total quality of life (WHOQOL) (N=108)</b>	M SD	45.25 9.06	57.79 7.32	7.66***	1<2
<b>Global functioning (GAF) (N=103)</b>	M SD	45.27 9.79	58.88 6.44	8.07***	1<2
<b>Marital satisfaction (KMS) (N=66)</b>	M SD	53.05 9.78	53.51 10.26	0.18	NS
<b>Parental satisfaction (KPS) (N=90)</b>	M SD	48.72 10.99	51.50 9.03	1.27	NS

**Note:** Group1 had current or lifetime PTSD as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAS=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Sheckman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

**Table 5.9. Adult attachment styles of participants with PTSD and no diagnoses Table 5.9. Adult attachment styles of participants with PTSD and no diagnoses**

<b>Adult Attachment Style</b>		<b>Group 1 PTSD</b>	<b>Group 2 No Diagnosis</b>	<b>Group Diff</b>
		<b>N=63</b>	<b>N=45</b>	
<b>Secure</b>	f	9.00	13.00	NS
	%	14.30	28.90	
<b>Fearful</b>	f	36.00	12.00	NS
	%	57.10	26.70	
<b>Preoccupied</b>	f	10.00	3.00	NS
	%	15.90	6.70	
<b>Dismissive</b>	f	8.00	17.00	1<2
	%	12.70	37.80	

**Note:** Group1 had current or lifetime PTSD as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. Cases were classified into the four adult attachment styles using the SPSS algorithm for the Experiences in Close Relationships Inventory in Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press. Chi Square (3, N=108) =17.22, p<.001. Within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. Group differences were interpreted as significant where cell standardised residuals equalled or exceeded an absolute value of 2.00.

Table 5.10. Recollections of child abuse among participants with alcohol and substance use disorders and no diagnoses

<b>Variable</b>		<b>Group 1 Alcohol and Substance use Disorders N=99</b>	<b>Group 2 No Diagnosis N=45</b>	<b>t</b>	<b>Group Diffs</b>
<b>INSTITUTIONAL ABUSE IAS (N=144)</b>	Specific institutional abuse	M SD 51.83 9.49	47.28 9.80	2.65**	1>2
	Total institutional abuse	M SD 52.71 10.03	46.83 10.58	3.21**	1>2
<b>CTQ-Institution (N=144)</b>	Physical abuse	M SD 51.43 10.00	48.67 9.66	1.55	NS
	Sexual abuse	M SD 53.53 10.69	47.92 8.42	3.39**	1>2
	Emotional abuse	M SD 51.15 9.10	45.43 12.48	2.76**	1>2
	Physical neglect	M SD 50.80 9.40	50.14 10.55	0.38	NS
<b>SPSA-Institution (N=144)</b>	Emotional neglect	M SD 49.89 10.00	48.51 9.98	0.77	NS
	Total severe institutional abuse	M SD 51.66 6.22	48.07 5.03	3.40**	1>2
	Severe institutional physical abuse	M SD 49.62 10.29	46.97 8.06	1.50	NS
	Severe institutional sexual abuse	M SD 53.90 9.75	47.85 8.66	3.57***	1>2

Variable		Group 1 Alcohol and Substance use Disorders N=99	Group 2 No Diagnosis N=45	t	Group Diffs
<b>CHILD ABUSE IN FAMILY</b> CTQ-family	Total family abuse score† (N=87)	M SD 50.80 9.70	46.31 5.52	2.70** Z=1.8	NS
	Physical abuse	M SD 52.18 11.15	46.37 5.88	3.15**	1>2
	Sexual abuse	M SD 50.10 9.58	47.44 1.91	2.10	NS
	Emotional abuse	M SD 50.39 9.84	45.49 4.10	3.27**	1>2
	Physical neglect	M SD 50.20 9.48	49.57 9.34	0.28	NS
	Emotional neglect	M SD 50.59 10.26	47.91 7.97	1.15	NS
	Total severe family abuse	M SD 51.80 10.18	46.37 6.64	2.91**	1>2
	Severe family physical abuse	M SD 52.18 10.70	46.65 8.24	2.57	NS
	Severe family sexual abuse	M SD 50.08 9.31	47.77 3.91	1.62	NS
	<b>SPSA-family (N=87)</b>				

**Note:** Group 1 had current or lifetime diagnoses of alcohol or substance use disorders as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. CTQ=Childhood Trauma Questionnaire (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse. To aid profiling, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. For the MANOVA on the total scores of the CTQ, SPSA & the IAS, F (3, 140) = 4.63, p<0.01. For the MANOVA on total scores of the family versions of the CTQ and SPSA, F (2, 141) =3.77, p<0.05. †Scores on the family version of the CTQ total scale violated the t-test assumption of normality and a Mann Whitney indicated that the intergroup differences on this variable were not statistically significant (Z=1.8, p>.05), so the significant t-test result may be disregarded. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

Table 5.11. Current adjustment of participants with alcohol and substance use and no diagnoses

		Group 1 Alcohol and Substance use Disorders N=99	Group 2 No Diagnosis N=45	t-value	Group Diff
<b>Total trauma symptoms (TSI) (N=144)</b>	M SD	54.93 8.93	39.66 5.83	12.23***	1>2
<b>Total No of life problems (LPC) (N=144)</b>	M SD	56.41 10.17	43.99 6.30	8.95***	1>2
<b>Total quality of life (WHOQOL) (N=144)</b>	M SD	46.64 10.09	57.79 7.32	7.48***	1<2
<b>Global functioning (GAF) (N=136)</b>	M SD	46.59 9.82	58.88 6.44	8.73***	1<2
<b>Marital satisfaction (KMS) (N=83)</b>	M SD	52.31 9.75	53.51 10.26	0.52	NS
<b>Parental satisfaction (KPS) (N=123)</b>	M SD	47.92 11.09	51.50 9.03	1.73	NS

**Note:** Group1 had current or lifetime alcohol or substance use disorders as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAS=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. E., Shectman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

Table 5.12. Recollections of child abuse among participants with avoidant personality disorder and no diagnoses

<b>Variable</b>		<b>Group 1 Avoidant Personality Disorder N=52</b>	<b>Group 2 No Diagnosis N=45</b>	<b>t</b>	<b>Group Diffs</b>
<b>INSTITUTIONAL ABUSE IAS (N=97)</b>	Specific institutional abuse	M SD 51.76 9.58	47.28 9.80	2.28	NS
	Total institutional abuse	M SD 50.41 8.12	46.83 10.58	1.89	NS
<b>CTQ-Institution (N=97)</b>	Physical abuse	M SD 50.86 9.13	48.67 9.66	1.15	NS
	Sexual abuse	M SD 49.50 10.05	47.92 8.42	0.83	NS
	Emotional abuse	M SD 51.58 7.96	45.43 12.48	2.84**	1>2
	Physical neglect	M SD 48.25 8.36	50.14 10.55	0.99	NS
<b>SPSA-Institution (N=97)</b>	Emotional neglect	M SD 51.38 9.93	48.51 9.98	1.42	NS
	Total severe institutional abuse	M SD 49.95 5.67	48.07 5.03	1.71	NS
	Severe institutional physical abuse	M SD 51.40 9.38	46.97 8.66	2.40	NS
	Severe institutional sexual abuse	M SD 48.87 10.35	47.85 8.66	0.52	NS

Variable		Group 1 Avoidant Personality Disorder N=52	Group 2 No Diagnosis N=45	t	Group Diff
<b>CHILD ABUSE IN FAMILY</b> CTQ-family (N=45)	Total family abuse score	M SD	46.31 5.52	2.66	NS
	Physical abuse	M SD	46.37 5.88	1.67	NS
	Sexual abuse	M SD	47.44 1.91	1.49	NS
	Emotional abuse	M SD	45.49 4.10	3.33**	1>2
	Physical neglect	M SD	49.57 9.34	1.02	NS
	Emotional neglect	M SD	47.91 7.97	2.51	NS
	Total severe family abuse	M SD	46.37 6.64	1.49	NS
	Severe family physical abuse	M SD	46.65 8.24	1.34	NS
	Severe family sexual abuse	M SD	47.77 6.37	0.78	NS
	<b>SPSA-family (N=45)</b>				

**Note:** Group 1 had avoidant personality disorder as assessed with the SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders*, (SCID-II). Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. CTQ=Childhood Trauma Questionnaire (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse. To aid profiling, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/(SD)X10)+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. For the MANOVA on all subscales of the institution versions of the CTQ, SPSA & the IAS, F (7, 89) = 2.63, p<0.05. For the MANOVA on all subscales of the family versions of the CTQ and SPSA, F (6, 38) = 3.83, p<0.01. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.



**Table 5.13. Current adjustment of participants with avoidant personality disorder and no diagnoses**

		<b>Group 1 Avoidant Personality Disorder</b> N=52	<b>Group 2 No Diagnosis</b> N=45	<b>t-value</b>	<b>Group Diff</b>
<b>Total trauma symptoms (TSI) (N=97)</b>	M SD	56.29 8.48	39.66 5.83	11.37***	1>2
<b>Total No of life problems (LPC) (N=97)</b>	M SD	50.25 8.67	43.99 6.30	4.01***	1>2
<b>Total quality of life (WHOQOL) (N=97)</b>	M SD	44.19 8.13	57.79 7.32	8.60***	1<2
<b>Global functioning (GAF) (N=93)</b>	M SD	43.17 7.97	58.87 6.44	10.42***	1>2
<b>Marital satisfaction (KMS) (N=55)</b>	M SD	49.12 8.88	53.51 10.26	1.10	NS
<b>Parental satisfaction (KPS) (N=80)</b>	M SD	49.03 10.82	51.50 9.03	1.10	NS

**Note:** Group1 had avoidant personality disorder as assessed with the SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders*, (SCID-II). Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAS=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Shectman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

**Table 5.14. Adult attachment styles of participants with avoidant personality disorder and no diagnoses Table 5.14. Adult attachment styles of participants with avoidant personality disorder and no diagnoses**

<b>Adult Attachment Style</b>		<b>Group 1 Avoidant Personality Disorder  N=52</b>	<b>Group 2 No Diagnosis  N=45</b>	<b>Group Diff</b>
<b>Secure</b>	f	3.00	13.00	1<2
	%	5.80	28.90	
<b>Fearful</b>	f	35.00	12.00	1>2
	%	67.30	26.70	
<b>Preoccupied</b>	f	4.00	3.00	NS
	%	7.70	6.70	
<b>Dismissive</b>	f	10.00	17.00	NS
	%	19.20	37.80	

**Note:** Group1 had avoidant personality disorder as assessed with the SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders, (SCID-II)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. Cases were classified into the four adult attachment styles using the SPSS algorithm for the Experiences in Close Relationships Inventory in Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press. Chi Square (3, N=97) =19.06, p<.001. Within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. Group differences were interpreted as significant where cell standardised residuals equalled or exceeded an absolute value of 2.00.

Table 5.15. Recollections of child abuse among participants with antisocial personality disorder and no diagnoses

Variable		Group 1 Antisocial Personality Disorder N=17	>Group 2 No Diagnosis N=45	t	Group Diff
<b>INSTITUTIONAL ABUSE</b> IAS	Specific institutional abuse (N=62)	M SD 52.08 9.86	47.28 9.80	1.72	NS
	Total institutional abuse (N=62)	M SD 55.17 9.10	46.83 10.58	2.87**	1>2
<b>CTQ-Institution</b>	Physical abuse	M SD 50.94 8.62	48.67 9.66	0.85	NS
	Sexual abuse	M SD 59.23 9.00	47.92 8.42	4.63***	1>2
	Emotional abuse	M SD 51.72 8.00	45.43 12.48	1.93	NS
	Physical neglect	M SD 49.11 9.07	50.14 10.55	0.37	NS
	Emotional neglect	M SD 50.18 10.52	48.51 9.98	0.58	NS
<b>SPSA-Institution (N=62)</b>	Total severe institutional abuse	M SD 51.15 6.53	48.07 5.03	1.98	NS
	Severe institutional physical abuse	M SD 44.27 10.54	46.97 8.66	1.03	NS
	Severe institutional sexual abuse	M SD 56.55 7.79	47.85 8.66	3.80**	1>2

Variable		Group 1 Antisocial Personality Disorder N=17	>Group 2 No Diagnosis N=45	t	Group Diff
<b>CHILD ABUSE IN FAMILY</b> CTQ-family (N=38)	Total family abuse score	M SD	46.31 5.52	2.18	NS
	Physical abuse	M SD	46.37 5.88	2.57	NS
	Sexual abuse	M SD	47.44 1.91	1.23	NS
	Emotional abuse	M SD	45.49 4.10	2.91	NS
	Physical neglect	M SD	49.57 9.34	0.06	NS
	Emotional neglect	M SD	47.91 7.97	1.21	NS
	Total severe family abuse	M SD	46.37 6.64	2.85	NS
<b>SPSA-family (N=38)</b>	Severe family physical abuse	M SD	46.65 8.24	2.30	NS
	Severe family sexual abuse	M SD	47.77 3.91	1.50	NS

**Note:** Group1 had antisocial personality disorder as assessed with the SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders* (SCID-II). Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. CTQ=Childhood Trauma Questionnaire (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse. To aid profiling, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. For the MANOVA on all subscales of the institution versions of the CTQ, SPSA & the IAS, F (10,51) = 10.98, p<0.0001. For the MANOVA on all subscales of the family versions of the CTQ and SPSA, , F (6, 31) = 3.00, p<0.05. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

Table 5.16. Current adjustment of participants with antisocial personality disorder and no diagnoses

		Group 1 Antisocial Personality Disorder N=17	Group 2 No Diagnosis N=45	t	Group Diff
<b>Total trauma symptoms (TSI) (N=62)</b>	M SD	56.62 11.09	39.66 5.83	6.00***	1>2
<b>Total No of life problems (LPC) (N=62)</b>	M SD	69.28 6.37	43.99 6.30	14.06***	1>2
<b>Total quality of life (WHOQOL) (N=62)</b>	M SD	44.25 11.36	57.79 7.32	5.54***	1<2
<b>Global functioning (GAF) (N=60)</b>	M SD	42.45 11.37	58.87 6.44	5.32***	1<2
<b>Marital satisfaction (KMS) (N=36)</b>	M SD	53.74 9.59	53.51 10.26	0.06	NS
<b>Parental satisfaction (KPS) (N=51)</b>	M SD	35.84 11.83	51.50 9.03	5.07***	1<2

**Note:** Group1 had antisocial personality disorder as assessed with the SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders*, (SCID-II). Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAS=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Shectman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)X10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

Table 5.17. Current adjustment of participants with borderline personality disorder and no diagnoses

		Group 1 Borderline Personality Disorder N=14	Group 2 No Diagnosis N=45	t	Group Diff
Total trauma symptoms (TSI) (N=59)	M SD	61.79 8.38	39.66 5.83	11.12***	1>2
Total No of life problems (LPC) (N=59)	M SD	61.16 11.13	43.99 6.30	5.50***	1>2
Total quality of life (WHOQOL) (N=59)	M SD	41.27 9.53	57.79 7.32	6.85***	1<2
Global functioning (GAF) (N=59)	M SD	38.07 12.38	58.87 6.44	6.04***	1<2
Marital satisfaction (KMS) (N=34)	M SD	48.12 15.16	53.51 10.26	0.93	NS
Parental satisfaction (KPS) (N=47)	M SD	46.21 12.93	51.50 9.03	1.50	NS

**Note:** Group1 had borderline personality disorder as assessed with the SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders* (SCID-II). Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). LPC=Life Problems Checklist. WHOQOL= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath). GAS=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Shectman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169). To aid profiling across variables, all variables were transformed to T-scores with means of 50 and standard deviations of 10 before t-tests were conducted. T-score for variable X = ((X-M)/SD)\*10+50, where X is the score of a case on variable X; M is the mean for all cases on variable X and SD is the standard deviation for all cases on variable X. t values are from t-tests for independent samples. \*\*p<0.01 \*\*\*p<0.001. NS=Not significant.

**Table 5.18. Adult attachment styles of participants with borderline personality disorder and no diagnoses**

<b>Adult Attachment Style</b>		<b>Group 1 Borderline Personality Disorder  N=14</b>	<b>Group 2 No Diagnosis  N=45</b>	<b>Group Diff</b>
<b>Secure</b>	f	1.00	13.00	NS
	%	7.10	28.90	
<b>Fearful</b>	f	11.00	12.00	1>2
	%	78.60	26.70	
<b>Preoccupied</b>	f	1.00	3.00	NS
	%	7.10	6.70	
<b>Dismissive</b>	f	1.00	17.00	NS
	%	7.10	37.80	

**Note:** Group1 had borderline personality disorder as assessed with the SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders, (SCID-II)*. Washington, DC: American Psychiatric Press). Group 2 had no diagnoses. Cases were classified into the four adult attachment styles using the SPSS algorithm for the Experiences in Close Relationships Inventory in Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press. Chi Square (3, N=59) =12.80, p<.01. Within each group the percentages sum to approximately 100. Minor deviations from 100 are due to rounding of decimals to two places. Percentages across rows do not sum to 100. Group differences were interpreted as significant where cell standardised residuals equalled or exceeded an absolute value of 2.00.

**Table 5.19. Institutional and family child abuse and neglect reported by participants with multiple co-morbid diagnoses, mood disorders, PTSD, substance use disorders, and personality disorders; and profiles of adult psychological adjustment**

	Multiple Co-morbid Diagnoses (4+)	Mood Disorders	PTSD	Alcohol and Substance Use Disorders	Avoidant Personality Disorder	Antisocial Personality Disorder	Borderline Personality disorder	No Diagnosis
<b>Institutional child abuse &amp; neglect</b>								
Physical institutional abuse	+	+	+	-	-	-	-	-
Sexual institutional abuse	+	+	+	+	-	+	-	-
Emotional institutional abuse	+	+	+	+	+	-	-	-
Physical institutional neglect	-	-	-	-	-	-	-	-
Emotional institutional neglect	-	-	-	-	-	-	-	-
<b>Family-based child abuse &amp; neglect</b>								
Physical family abuse	-	-	-	+	-	-	-	-
Sexual family abuse	-	-	-	-	-	-	-	-
Emotional family abuse	-	-	+	+	+	-	-	-
Physical family neglect	-	-	-	-	-	-	-	-
Emotional family neglect	-	-	-	-	-	-	-	-
<b>Adult psychological adjustment</b>								
>50% comorbid anxiety disorder	+	+	+	+	+	+	+	-
>50% co-morbid mood disorder	+	+	-	-	+	-	+	-
>50% comorbid substance use disorder	+	-	+	-	-	+	+	-
>50% comorbid personality disorder	+	-	-	-	-	-	-	-
Multiple trauma symptoms	+	+	+	+	+	+	+	-
Multiple life problems	+	+	+	+	+	+	+	-
Low quality of life	+	+	+	+	+	+	+	-
Low parenting satisfaction	-	-	-	-	-	+	-	-
Fearful adult attachment style	+	+	-	-	+	-	+	-
Low socio economic status	+	-	-	+	-	+	-	-

Note: +=the feature was a significant element of the group profile. - the feature was not a significant element of the group profile.



## Part 6 Psychological processes and coping strategies associated with institutional abuse

### Summary of Part 6

- 3.274** Six scales were developed to measure past and present psychological processes theoretically purported to arise from the experience of institutional abuse, and associated functional and dysfunctional coping strategies. The scales were (1) **traumatization** which assesses negative emotions arising from abuse, betrayal and loss of trust, stigmatization, shame, guilt, and disrespect of authority; (2) **re-enactment** which assesses re-enactment of abuse, powerlessness, coping by opposing and coping by using alcohol and drugs; (3) **spiritual disengagement** which assesses disengagement from religious practice and not using spiritual coping strategies; (4) **positive coping** which assesses coping through planning, skill mastery and social support; (5) **coping by complying** which assesses coping by complying with the wishes of people in authority; and (6) **avoidant coping** which assesses coping by avoiding thoughts and situations associated with abuse.
- 3.275** All participants reported a reduction in traumatization and re-enactment and an increase in spiritual disengagement from childhood to adult life. They also reported an increase in the use of positive coping strategies and a reduction in the use of coping by complying and avoidant coping.
- 3.276** The psychological processes of traumatization and re-enactment as experienced now or remembered from childhood were associated multiple indices of institutional abuse, but not family-based child abuse.
- 3.277** Time spent living with one's family in childhood was a protective factor and was associated with reduced traumatization in adulthood, whereas severe family-based child abuse was associated with avoidant coping in adulthood.
- 3.278** Participants for whom severe physical and sexual abuse, or severe sexual abuse alone were the worst things that happened to them in institutions, reported greater past re-enactment of abusive experiences, than those for whom worst experiences involved severe physical or emotional abuse.
- 3.279** Traumatization and re-enactment as experienced now or remembered from childhood were associated multiple indices of adult adjustment including the presence of multiple trauma symptoms, multiple adult life problems, global functioning, quality of life, interpersonal anxiety and interpersonal avoidance.
- 3.280** Participants with four or more psychological disorders reported greatest past and present traumatization and re-enactment; greatest current use of avoidant coping; and least current use of positive coping. Participants with no diagnoses, reported least present traumatization, re-enactment and use of avoidant coping; and the greatest reduction in traumatization from past to present. However, they showed a negligible increase in the use of positive coping strategies from past to present.
- 3.281** Positive coping was associated with marital satisfaction and quality of life. Participants who spent 5-11 years in an institution and placement occurred through the courts reported greater use of positive coping strategies in the past, than those who spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. These in turn reported greater use of these strategies than participants who spent more than 12 years in an institution and entered before age 5.

**3.282** Participants who reported that severe physical abuse was the worst thing that happened to them in institutions, reported greatest coping by complying, and lowest levels of coping by complying occurred among those that reported that severe sexual abuse was the worst thing that happened to them in institutions. For present coping by complying, intermediated between these extremes was the group that reported that severe emotional abuse was the worst thing that happened to them in institutions.

**3.283** A model was developed which shows how childhood institutional abuse is associated with the processes of traumatization, re-enactment and spiritual disengagement, which in turn are associated with adult mental health and quality of life. The model also shows how childhood years within the family and current use of positive coping strategies are associated with quality of life.

### ***Introduction***

**3.284** In this Part an account is given of the development of a set of 6 scales to measure past and present psychological processes theoretically purported to arise from the experience of institutional abuse, and associated functional and dysfunctional coping strategies. These scales are then used to address a series of five questions about the association between abuse processes and coping strategies on the one hand and the following variables (1) recollections of institutional abuse and family-based child abuse; (2) adult adjustment; (3) duration of time spent in institutions and circumstances of entry to institutions; (4) types of worst abusive experiences in institutions (5) number of psychological disorders. The Part closes with the presentation of a model which links childhood experiences of institutional abuse with adult adjustment, via psychological processes and coping strategies.

### ***Theoretical basis for development of scales to measure abuse processes and coping strategies***

**3.285** Professor David Wolfe has argued that the long-term outcomes of child abuse are probably mediated by distinctive psychological processes (Wolfe et al., 2003) including traumatization, betrayal, disrespect for authority, stigmatization, powerlessness, avoidance of reminders of abuse, and re-enactment of abuse on self or others. The research literature on clerical abuse indicates that in addition to the processes identified by Wolfe, survivors of clerical abuse may also disengage from religious and spiritual beliefs and practices (e.g. Bottoms et al., 1995; Fater & Mullaney, 2000; Farrell & Taylor, 2000; McLaughlin, 1994, Wolfe et al., 2006). The research literature on stress and coping in children exposed to early childhood adversity suggests that children may use both functional and dysfunctional coping strategies to deal with institutional abuse (Luthar, 2003; Rutter et al., 1990). Functional coping strategies include social support, skill mastery, planning and spiritual support. Dysfunctional coping strategies may include either fully complying with the abusive regime or aggressively opposing it without due regard to the risks of further abuse entailed by this. Excessive consumption of alcohol, drugs and food are other potentially dysfunctional coping strategies.

### ***Rational subscales included in the Institutional Abuse Processes and Coping Inventory (IAPCI)***

**3.286** In light of these insights from the broad literature on child abuse and coping, the Institutional Abuse Processes and Coping Inventory (IAPCI) was developed for the present study, to facilitate investigation of psychological processes and coping strategies in survivors of institutional abuse. The IAPCI contained rational subscales to assess the following processes: (1) traumatization, (2) betrayal, (3) disrespect of authority, (4) religious disengagement, (5) stigmatization, (6) powerlessness, (7) avoidance, and (8) re-enactment. The following functional coping strategies were assessed with the IAPCI: (1) social support, (2) skill mastery, (3) planning, and (4) spiritual support. The inventory also assessed these dysfunctional coping strategies: (1) overcomplying,

(2) aggressively opposing, and (3) substance abuse. Two versions the IACPI were developed for the present study. The first inquired about processes and coping strategies used while living in an institution and the second inquired about the same processes and coping strategies in the person's present life. The IACPI is part of the protocol contained in Appendix 1, which was completed by the 247 participants in this study.

### ***Development of IACPI factor scales***

- 3.287** A series of analyses were conducted on the IACPI with the aim of developing a set of factorially valid and psychometrically reliable factor scales which contained the same items for past and present versions.
- 3.288** Initially, principal component analyses (PCA) of total scores from rational scales for past and present versions of the IACPI were conducted. These PCAs each yielded similar, although not identical, five factor solutions. The five factors were named traumatization; re-enactment; spiritual disengagement; positive coping; and coping by complying.
- 3.289** The next step involved conducting factor analyses on items from past and present versions of the IACPI. These each yielded very similar (though not identical) 5 factor solutions. The five factors were very similar to those identified through principal components analysis of total scores from rational scales. The five factors were named in a similar manner, i.e., traumatization, re-enactment, spiritual disengagement, positive coping, and coping by complying.
- 3.290** Internal consistency alpha reliability co-efficients were obtained for rational scales and factor scales from the factor analyses of items. The reliability analyses pointed to a number of significant problems. Few of the narrowband rational scales were reliable for both past and present versions. Not all of the factor scales were reliable. Past and present versions had different item compositions, so past and present scores could not be compared. Also avoidant coping, which is a clinically and theoretically important coping strategy did not emerge in a coherent way in the PCA or factor analysis solutions.
- 3.291** To design the final 6 IACPI factor scales, in 4 instances rational scales were combined in coherent ways consistent with the results of PCAs of rational scale totals, factor analyses of items, and trauma theory. Items were dropped if they keyed differently for past and present versions of the IACPI or detracted from scale internal consistency reliability in alpha reliability analyses. The four scales constructed in this way were named traumatization, re-enactment, spiritual disengagement, and positive coping. The remaining two scales were each rational scales: coping by complying and avoidant coping. What follows are brief descriptions of the six IACPI factor scales.
- 3.292** **Traumatization** is a 14 item scale which assesses traumatization; betrayal and loss of trust; stigmatization, shame and guilt; and disrespect of authority.
- 3.293** **Re-enactment** is an 9 item scale which assesses re-enactment of abuse, powerlessness, coping by opposing and coping by using alcohol and drugs.
- 3.294** **Spiritual disengagement** is a 5 item scale which assesses disengagement from religious practice and not using spiritual coping strategies.
- 3.295** **Positive coping** is a 9 item scale which assesses coping through planning, skill mastery and social support.
- 3.296** **Coping by complying** is a 3 item scale which assesses coping by complying with the wishes of people in authority.

**3.297** **Avoidant coping** is a 3 item scale which assesses coping by avoiding thoughts and situations associated with abuse.

### **Confirmatory factor analyses**

**3.298** The item composition of past and present versions of the 6 IAPCI factor scales is presented in Table 6.1. Two confirmatory factor analyses were conducted to evaluate the factorial validity of past and present versions of the 6 IAPCI factor scales. Two confirmatory factor models, using the structure in Table 6.1, were specified and estimated using LISREL 8.72 (Jöreskog & Sörbom, 2005a). Model 1 was the Present IAPCI and Model 2 was the Past IAPCI. Analyses were based on a covariance matrix and an asymptotic weight matrix (the distribution of all IAPCI items deviated significantly from normality in terms of skewness and kurtosis) computed using PRELIS 2.72 (Jöreskog & Sörbom, 2005b) and the parameters estimated using maximum likelihood. The use of an asymptotic weight matrix allows for weaker assumptions regarding the distribution of the observed variables and results in improved fit and test statistics (Satorra, 1992; Curran, West, & Finch, 1996). All models were specified to allow the factors to correlate, have no cross-factor loadings, and initially have no correlated errors.

**3.299** Following the guidelines suggested by Hoyle and Panter (1995) the goodness of fit for each model was assessed using the Sattora–Bentler scaled chi-square ( $S-B\chi^2$ ), the Incremental Fit Index (IFI: Bollen, 1989), and the Comparative Fit Index (CFI: Bentler, 1990). A non-significant chi-square, and values greater than .90 for the IFI and CFI are considered to reflect acceptable model fit. In addition, the Root Mean Square Error of Approximation (RMSEA: Steiger, 1990) with 90% confidence intervals (90%CI) were reported, where a value less than .05 indicates close fit and values up to .08 indicating reasonable errors of approximation in the population (Jöreskog & Sörbom, 1993). The standardized root-mean-square residual (SRMR: Jöreskog & Sörbom, 1981) has been shown to be sensitive to model mis-specification and its use recommended by Hu and Bentler (1999). Values less than .08 are considered to be indicative of acceptable model fit (Hu & Bentler, 1998).

**3.300** Model 1 was considered to be a reasonable description of the sample data ( $S-B\chi^2=1767$ ,  $df=845$ ,  $p=.00$ ;  $RMSEA=.07$  (90%CI .06-.07);  $CFI=.86$ ;  $IFI=.86$ ;  $SRMR=.08$ ) although the residuals indicated that the Institutional Traumatization factor was not adequately explaining the covariation between two item pairs (DC2 & DC3 and SC2 & SC3), and the Positive Coping factor was not adequately explaining the covariation between items CTC1 and CTC2. The inclusion of three correlated errors improved the fit of the model ( $S-B\chi^2=1544$ ,  $df=842$ ,  $p=.00$ ;  $RMSEA=.06$  (90%CI .05-.06);  $CFI=.90$ ;  $IFI=.90$ ;  $SRMR=.08$ ). The improvement in model fit was statistically significant ( $S-B\chi^2=223$ ,  $df=3$ ,  $p=.00$ ). The standardized factor loading are reported in Table 6.2. All factor loading are statistically significant ( $p<.05$ ). The factor correlations are reported below in Table 6.3.

**3.301** Model 2 was considered to be a reasonable description of the sample data ( $S-B\chi^2=1383$ ,  $df=845$ ,  $p=.00$ ;  $RMSEA=.05$  (90%CI .05-.06);  $CFI=.86$ ;  $IFI=.86$ ;  $SRMR=.08$ ) although the residuals indicated that the Powerless Re-enactment factor was not adequately explaining the covariation between two item pairs (XP1 & XP2 and XP3 & XP4). The inclusion of two correlated errors improved the fit of the model ( $S-B\chi^2=1292$ ,  $df=843$ ,  $p=.00$ ;  $RMSEA=.05$  (90%CI .04-.05);  $CFI=.90$ ;  $IFI=.90$ ;  $SRMR=.08$ ). The improvement in model fit was statistically significant ( $S-B\chi^2=223$ ,  $df=2$ ,  $p=.00$ ). The standardized factor loading are reported in Table 6.2. With the exception of two items (BP1 and PP3) all factor loading are statistically significant ( $p<.05$ ). The factor correlations are reported in Table 6.3.

**3.302** Thus, the confirmatory factor analyses supported the factorial validity of the six factor scales of the past and present versions of the IAPCI shown in Table 6.1

### ***Reliability analyses***

**3.303** Internal consistency alpha reliability coefficients were calculated for past and present versions of each of the 6 IACPI factor scales. Also, for 52 cases inter-rater reliability was evaluated using the split-half method, treating ratings by each rater as two halves of the same scale. From Table 6.4 it may be seen that alpha reliabilities ranged from .51 to .87 (with 7 of the 12 alpha coefficients close to, or above .7) indicating moderate to good internal consistency reliability for all IACPI scales. 11 of the 12 inter-rater reliability coefficients were above .7 indicating good inter-rater reliability for 11 scales and moderate inter-rater reliability for one scale (past coping by complying).

### ***Questions investigated with the IACPI***

**3.304** Having developed a set of IACPI factor scales to measure past and present psychological processes theoretically purported to arise from the experience of institutional abuse, and associated functional and dysfunctional coping strategies, a series of analyses were conducted to answer the questions listed below.

**3.305** The first question was: Are past and present institutional abuse processes and coping strategies (as evaluated by the IACPI factor scales) associated with recollections of institutional abuse but not family-based child abuse?

**3.306** The second question was: Are past and present institutional abuse processes and coping strategies (as evaluated by the IACPI factor scales) associated with indices of adult adjustment?

**3.307** The third question was: Do participants who had spent different amounts of time in institutions and entered under different circumstances differ in their experience of past and present institutional abuse processes and coping strategies as evaluated by the IACPI factor scales?

**3.308** The fourth question was: Do participants who had different types of worst abusive experiences in institutions differ in their experience of past and present institutional abuse processes and coping strategies as evaluated by the IACPI factor scales?

**3.309** The fifth question was: Do participants who with multiple co-morbid psychological disorders, fewer disorders and no disorders differ in their experience of past and present institutional abuse processes and coping strategies as evaluated by the IACPI factor scales?

### ***The IACPI scales and institutional and family abuse***

**3.310** The following analyses were carried out to address the first question which was: Are past and present institutional abuse processes and coping strategies (as evaluated by the IACPI factor scales) associated with recollections of institutional abuse but not family-based child abuse? First, Pearson product moment correlations were conducted between IACPI scales on the one hand, and indices of institutional abuse on the other. These analyses are summarized in Table 6.5. Next, Pearson product moment correlations were conducted between IACPI scales on the one hand, and indices of family-based child abuse on the other. These analyses are summarized in Table 6.6. In these analyses, the indices of institutional and family-based abuse were: the number of years spent living in an institution; the total, severe physical and severe sexual abuse scale scores of the institution and family versions of the Severe Physical and Sexual Abuse scale (SPSA); the total score on the Institutional Abuse Scale (IAS); and the total, physical abuse, sexual abuse, emotional abuse, physical neglect and emotional neglect scale scores of the institution and family versions of the Childhood Trauma Questionnaire (CTQ). Correlations with an absolute value above .3 and significant at  $p < .01$  were interpreted as indicating a moderate association between variables.



**3.311** From Table 6.5 it may be seen that 16 correlations with an absolute value above .3 and significant at  $p < .01$  occurred when IAPCI scales were correlated with indices of institutional abuse and neglect. In contrast only two such correlation occurred between IAPCI scales and indices of family-based child abuse and neglect. Thus, IAPCI scale scores were far more strongly associated with recollections of institutional abuse than family-based child abuse.

**3.312** From Table 6.5, it may be seen that both past and present versions of the traumatization scale, and the past version of the re-enactment scale had large significant correlations with multiple indices of institutional abuse. Specifically, the past and present version of the IAPCI traumatization scale correlated with the total, physical and emotional abuse scales of the institution version of the CTQ. The past version of the IAPCI traumatization scale also correlated with the SPSA severe institutional physical abuse scale, the IAS total scale, and the physical neglect scale of the institution version of the CTQ. The present version of the IAPCI traumatization scale also correlated with the SPSA total severe institutional abuse scale. The past version of the IAPCI re-enactment scale correlated with the SPSA total and severe institutional sexual abuse scales; the IAS total scale; and the total, physical and sexual abuse scales of the institution version of the CTQ.

**3.313** From Table 6.6 it may be seen that the present IAPCI traumatization scale correlated negatively with the number of years spent living with the family before 16. The present IAPCI avoidant coping scale correlated with SPSA total severe family-based abuse scale. Thus children who lived longer with their families as children reported less current traumatization as adults; and children who experienced severe child abuse within the family used greater avoidant coping as adults.

**3.314** The analysis reported in this section provided an answer to the question about the association between past and present abuse processes and coping strategies on the one hand and recollections of institutional abuse but not family-based child abuse on the other. Collectively the results show that the psychological processes of traumatization and re-enactment as experienced now or remembered from childhood were associated multiple indices of institutional abuse, but not family-based child abuse. Time spent living with one's family in childhood was a protective factor and was associated with reduced traumatization in adulthood, whereas severe family-based child abuse was associated with avoidant coping in adulthood.

### ***The IAPCI scales and adult adjustment***

**3.315** The following analyses were carried out to address the second question which was: Are past and present institutional abuse processes and coping strategies (as evaluated by the IAPCI factor scales) associated with indices of adult adjustment? Pearson product moment correlations were conducted between IAPCI scales on the one hand and indices of adult adjustment on the other. These analyses are summarized in Table 6.7. In these analyses the indices of adjustment were: total number of current and lifetime psychological disorders; the total score on the Life Problems Checklist (LPC); the score on the Global Assessment of Functioning (GAF) scale; the total score on the Trauma Symptom Inventory (TSI); Socio economic status (SES); the number of failed marital or cohabiting relationships in a participants life; the total score on the Kansas Marital Satisfaction scale (KMS); scores on the interpersonal anxiety and avoidance scales of the Experiences in Close Relationships Inventory (ECRI); the total score on the Kansas Parent Satisfaction scale; and the total score on the World health Organization Quality of Life Scale. Correlations with an absolute value above .3 and significant at  $p < .01$  were interpreted as indicating a moderate association between variables.

**3.316** From table 6.7 it may be seen that 17 correlations with an absolute value above .3 and significant at  $p < .01$  occurred and 15 of these involved the traumatization and re-enactment scales.

**3.317** Past and present versions of the traumatization and re-enactment scales correlated with the total number of trauma symptoms on the TSI. Past and present versions of the re-enactment scale correlated with the total number of life problems on the LPC. The present version of the traumatization and re-enactment scales correlated positively with the total number of disorders and negatively with global functioning on the GAF and the total quality of life score of the WHOQOL 100 UK. The present version of the traumatization scale correlated with the ECRI interpersonal anxiety and avoidance scales. The present version of the re-enactment scale correlated with the ECRI interpersonal anxiety scale. The present version of the positive coping scale correlated with the KMS marital satisfaction score and the total quality of life score of the WHOQOL 100 UK.

**3.318** The analysis reported in this section provided an answer to the question about the association between past and present abuse processes and coping strategies on the one hand and adult adjustment on the other. Collectively the results show that the psychological processes of traumatization and re-enactment as experienced now or remembered from childhood were associated multiple indices of adult adjustment including the presence of multiple co-morbid psychological disorders, multiple trauma symptoms, multiple adult life problems, global functioning, quality of life, interpersonal anxiety and interpersonal avoidance. Positive coping was associated with marital satisfaction and quality of life.

### ***IAPCI profiles of groups of participants who had spent different amounts of time in institutions and entered under different circumstances***

**3.319** The following analyses were carried out to address the third question which was: Do participants who had spent different amounts of time in institutions and entered under different circumstances differ in their experience of past and present institutional abuse processes and coping strategies as evaluated by the IAPCI factor scales? The four groups included in this set of analyses, were those referred to in the main analysis in Part 4. Group 1 contained 110 participants who spent more than 12 years in an institution and entered before age 5. Group 2 contained 67 participants who spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. Group 3 contained 22 participants who spent 5-11 years in an institution and placement occurred through the courts, in most instances for petty crime. Group 4 contained 48 participants who spent 4 or fewer years in institution. To aid profiling, all IAPCI scales were scored so they each had a range of 1-5. This was obtained for each scale by summing items and dividing by the number of items. A series of twelve one-way analyses of variance (ANOVAs) were used to test for significant ( $p < .05$ ) variation between groups on either past or present versions of each IAPCI scales, and Scheffe post hoc tests for comparing groups with unequal Ns were used to identify significant ( $p < .05$ ) intergroup differences. Dunnett's post hoc tests were used where the assumption of homogeneity was violated. In addition to the one-way ANOVAs, a series of six 4X2, Groups X Time repeated measures ANOVAs were used to identify significant changes from past to present on each IAPCI scale.

**3.320** From Table 6.8 it may be seen that in the one-way ANOVAs, past positive coping was the only IAPCI scale on which the four groups differed significantly, with group 3 obtaining higher scores than group 2, who in turn obtained higher scores than group 1. There were no significant Group X Time interactions in the repeated measures ANOVAs, indicating that there were no significant intergroup differences in the pattern of past and present scores. All four of the groups showed the same pattern of change. In all of the repeated measures ANOVAs significant time effects occurred. For traumatization and re-enactment, mean scores decreased from the past to the present, but for spiritual disengagement, they increased. Positive coping mean scores increased from past to present, but coping by complying and avoidant coping mean scores decreased.

**3.321** The analysis reported in this section provided an answer to the question about differences in IAPCI profiles of participants who had spent different amounts of time in institutions and entered under different circumstances. Participants who spent 5-11 years in an institution and placement occurred through the courts reported greater use of positive coping strategies in the past, than those who spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. These in turn reported greater use of these strategies than participants who spent more than 12 years in an institution and entered before age 5. Participants from all four groups reported a reduction in traumatization and re-enactment and an increase in spiritual disengagement from childhood to adult life. They also reported an increase in the use of positive coping strategies and a reduction in the use of coping by complying and avoidant coping.

### ***IAPCI profiles of groups of participants who reported different types of worst abusive experiences in institutions***

**3.322** The following analyses were carried out to address the fourth question which was: Do participants who reported different types of worst abusive experiences in institutions differ in their experience of past and present institutional abuse processes and coping strategies as evaluated by the IAPCI factor scales? The four groups included in this set of analyses, were those referred to in the second analysis in Part 4. Group 1 contained 23 cases where the worst thing reported was severe physical and sexual abuse. Group 2 contained 99 cases where the worst thing they had experienced was severe physical abuse. Group 3 contained 40 cases where the worst thing they had experienced was severe sexual abuse. Group 4 contained 85 cases where the worst thing they had experienced was severe emotional abuse. Participant's statements were classified as severe physical abuse if the person reported physical violence, beating, slapping, or being physically injured, but not having medical attention withheld. Statements were classified as severe sexual abuse if the person reported the words sexual abuse or mentioned rape; genital, anal or oral sex; masturbation; or other coercive sexual activities involving either staff or older pupils. Statements were classified as severe physical and sexual abuse if they involved both severe physical abuse and severe sexual abuse as defined earlier. Statements of actions involving humiliation, degradation, severe lack of care, withholding medical treatment, witnessing the traumatization of other pupils and adverse experiences that were not clearly classifiable as severe sexual or physical abuse were classified as severe emotional abuse. Inter-rater agreement greater than 90% was achieved for a sample of 10% of statements. To aid profiling, all IAPCI scales were scored so they each had a range of 1-5. This was obtained for each scale by summing items and dividing by the number of items. A series of twelve one-way analyses of variance (ANOVAs) were used to test for significant ( $p < .05$ ) variation between groups on either past or present versions of each IAPCI scales, and Scheffe post hoc tests for comparing groups with unequal Ns were used to identify significant ( $p < .05$ ) intergroup differences. Dunnett's post hoc tests were used where the assumption of homogeneity was violated. In addition to the one-way ANOVAs, a series of six 4X2, Groups X Time repeated measures ANOVAs were used to identify significant changes from past to present on each IAPCI scale.

**3.323** From Table 6.9 it may be seen that in the one-way ANOVAs, past re-enactment and both past and present coping by complying were the only IAPCI scales on which the four groups differed significantly. Mean past re-enactment scores for groups 1 and 3 were significantly greater than those for groups 2 and 4. Group 2's mean past and present coping by complying scores were significantly greater than those of group 3, with group 4 obtaining a mean score between these extremes for present, but not past, coping by complying.

**3.324** There were no significant Group X Time interactions in the repeated measures ANOVAs, indicating that there were no significant intergroup differences in the pattern of past and present scores.



**3.325** The analysis reported in this section provided an answer to the question about differences in IAPCI profiles of participants who reported different types of worst abusive experiences in institutions. Participants for whom severe physical and sexual abuse, or severe sexual abuse alone were the worst things that happened to them in institutions, reported greater past re-enactment of abusive experiences, than those for whom worst experiences involved severe physical or emotional abuse. Participants who reported that severe physical abuse was the worst thing that happened to them in institutions, reported greatest past and present coping by complying, and lowest levels of coping by complying occurred among those that reported that severe sexual abuse was the worst thing that happened to them in institutions. For present coping by complying, intermediate between these extremes was the group that reported that severe emotional abuse was the worst thing that happened to them in institutions.

***IAPCI profiles of groups of participants who groups of participants who had different numbers of psychological diagnoses***

**3.326** The following analyses were carried out to address the fifth question which was: Do participants who had different numbers of psychological diagnoses differ in their experience of past and present institutional abuse processes and coping strategies as evaluated by the IAPCI factor scales? The three groups included in this set of analyses, were those referred to in the first analysis in Part 5. Group 1 contained 83 participants who had four or more current or lifetime diagnoses as assessed with the SCID I and SCID II. Group 2 contained 119 participants who had 1-3 current or lifetime diagnoses. Group 3 contained 45 participants who had no diagnoses. To aid profiling, all IAPCI scales were scored so they each had a range of 1-5. This was obtained for each scale by summing items and dividing by the number of items. A series of twelve one-way analyses of variance (ANOVAs) were used to test for significant ( $p < .05$ ) variation between groups on either past or present versions of each IAPCI scales, and Scheffe post hoc tests for comparing groups with unequal Ns were used to identify significant ( $p < .05$ ) intergroup differences. Dunnett's post hoc tests were used where the assumption of homogeneity was violated. In addition to the one-way ANOVAs, a series of six 4X2, Groups X Time repeated measures ANOVAs were used to identify significant changes from past to present on each IAPCI scale.

**3.327** From Table 6.10 it may be seen that in the one-way ANOVAs, the three groups differed significantly in their mean scores on the past and present versions of the traumatization and re-enactment scales, and on the present versions of the positive and avoidant coping scales. On the past and present versions of the traumatization and re-enactment scales, group 1 obtained a significantly higher mean scores than groups 2 and 3. On the present versions of the traumatization and re-enactment scales, group 2 obtained a significantly higher mean score than groups 3. On the present version of the positive coping scale, group 1 obtained a significantly lower mean score than group 2. On the present version of the avoidant coping scale, group 1 obtained a significantly higher mean score than group 3.

**3.328** On the repeated measures ANOVAs there were significant Group X Time interactions for traumatization and positive coping. From the first panel in Figure 6.1 it may be seen that group 3 with no disorders showed a greater reduction in traumatization from past to present, than the other two groups, who had multiple co-morbid psychological disorders. From the second panel in Figure 6.1 it may be seen that for positive coping, group 3 with no disorders showed a negligible increase in the use of positive coping strategies from past to present, compared with the other two groups who showed a marked increase in positive coping from past to present.

**3.329** The analysis reported in this section provided an answer to the question about differences in IAPCI profiles of participants who had different numbers of psychological diagnoses. Participants with four or more disorders reported greatest past and present traumatization and re-enactment; greatest current use of avoidant coping and least current use of positive coping. Participants with

no diagnoses, reported least present traumatization, re-enactment and use of avoidant coping; and the greatest reduction in traumatization from past to present. However, they showed a negligible increase in the use of positive coping strategies from past to present.

### ***Model of childhood institutional abuse, psychological processes, and adult adjustment***

**3.330** A theoretical model of childhood institutional abuse, psychological processes, and adult adjustment is presented in Figure 6.2. The model shows how childhood institutional abuse is associated with the processes of traumatization, re-enactment and spiritual disengagement, which in turn are associated with mental health and quality of life. The model also shows how childhood years within the family and current use of positive coping strategies are associated with quality of life. The reliabilities of the composite scores used in the model were incorporated using the method suggested by Jöreskog and Sörbom (1993). The model presented in Figure 6.2 was specified and estimated using LISREL8.52 (Jöreskog & Sörbom, 2002). A covariance matrix and an asymptotic weight matrix were computed using PRELIS2.3 (Jöreskog & Sörbom, 1999) and the parameters estimated using maximum likelihood. Following the guidelines suggested by Hoyle and Panter (1995) the goodness of fit for each model was assessed using the chi-square, the Goodness of Fit Index (GFI: Jöreskog & Sörbom, 1981), the Incremental Fit Index (IFI: Bollen, 1989), and the Comparative Fit Index (CFI: Bentler, 1990). A non-significant chi-square, and values greater than 0.90 for the GFI, IFI and CFI, are considered to reflect acceptable model fit. In addition, the Root Mean Square Error of Approximation (RMSEA: Steiger, 1990) with 90% confidence intervals (90% CI) were reported, where a value less than 0.05 indicates close fit and values up to 0.08 indicating reasonable errors of approximation in the population (Jöreskog & Sörbom, 1993). The standardised root-mean-square residual (SRMR: Jöreskog & Sörbom, 1981) has been shown to be sensitive to model mis-specification and its use recommended by Hu and Bentler (1999). Values less than .08 are considered to be indicative of acceptable model fit. The fit indices are reported in Table 6.11. On the basis of the RMSEA, IFI, CFI, SRMR and the GFI the model is judged to be an acceptable description of the sample data. Although the chi-square for this model is large relative to the degrees of freedom, and statistically significant, this should not lead to the rejection of the model as the large sample size increases the power of the test (Tanaka, 1987). The standardized model parameters are presented in Table 6.12.

### ***Conclusions***

- 3.331** Six scales were developed to measure past and present psychological processes theoretically purported to arise from the experience of institutional abuse, and associated functional and dysfunctional coping strategies. The scales were (1) traumatization, (2) re-enactment, (3) spiritual disengagement, (4) positive coping, (5) coping by complying, and (6) avoidant coping.
- 3.332** All participants reported a reduction in traumatization and re-enactment and an increase in spiritual disengagement from childhood to adult life. They also reported an increase in the use of positive coping strategies and a reduction in the use of coping by complying and avoidant coping.
- 3.333** The psychological processes of traumatization and re-enactment as experienced now or remembered from childhood were associated multiple indices of institutional abuse, but not family-based child abuse.
- 3.334** Time spent living with one's family in childhood was a protective factor and was associated with reduced traumatization in adulthood, whereas severe family-based child abuse was associated with avoidant coping in adulthood.
- 3.335** Participants for whom severe physical and sexual abuse, or severe sexual abuse alone were the worst things that happened to them in institutions, reported greater past re-enactment of abusive

experiences, than those for whom worst experiences involved severe physical or emotional abuse.

- 3.336** Traumatization and re-enactment as experienced now or remembered from childhood were associated multiple indices of adult adjustment including the presence of multiple trauma symptoms, multiple adult life problems, global functioning, quality of life, interpersonal anxiety and interpersonal avoidance.
- 3.337** Participants with four or more psychological disorders reported greatest past and present traumatization and re-enactment; greatest current use of avoidant coping; and least current use of positive coping. Participants with no diagnoses, reported least present traumatization, re-enactment and use of avoidant coping; and the greatest reduction in traumatization from past to present. However, they showed a negligible increase in the use of positive coping strategies from past to present.
- 3.338** Positive coping was associated with marital satisfaction and quality of life. Participants who spent 5-11 years in an institution and placement occurred through the courts reported greater use of positive coping strategies in the past, than those who spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. These in turn reported greater use of these strategies than participants who spent more than 12 years in an institution and entered before age 5.
- 3.339** Participants who reported that severe physical abuse was the worst thing that happened to them in institutions, reported greatest coping by complying, and lowest levels of coping by complying occurred among those that reported that severe sexual abuse was the worst thing that happened to them in institutions. For present coping by complying, intermediated between these extremes was the group that reported that severe emotional abuse was the worst thing that happened to them in institutions.
- 3.340** A model was developed which shows how childhood institutional abuse is associated with the processes of traumatization, re-enactment and spiritual disengagement, which in turn are associated with adult mental health and quality of life. The model also shows how childhood years within the family and current use of positive coping strategies are associated with quality of life.

Table 6.1. Item composition of the 6 factor scales from the Institutional Abuse Process and Coping Inventory.

ITEM CODE	PAST VERSION	ITEM CODE	PRESENT VERSION
1TP1 3TP2 5TP3 7TP4	<b>PAST TRAUMATIZATION</b> <b>Traumatization</b> I felt hurt then I felt frightened then I felt sad then I felt humiliated then	2TC1 4TC2 6TC3 8TC4	<b>PRESENT TRAUMATIZATION</b> <b>Traumatization</b> I feel hurt now I feel frightened now I feel sad now I feel humiliated now
9BP1 11BP2 13BP3	<b>Betrayal and loss of trust</b> I trusted everyone then (-) I felt betrayed then I cut myself off from other people then	10BC1 12BC2 14BC3	<b>Betrayal and loss of trust</b> I trust everyone now (-) I feel betrayed now I cut myself off from other people now
29SP1 31SP2 33SP3 35SP4	<b>Stigmatization shame and guilt</b> I felt I was worthless then I felt I was dirty then I felt ashamed then I felt guilty and believed the abuse was my fault then	30SC1 32SC2 34SC3 36SC4	<b>Stigmatization shame and guilt</b> I feel I am worthless now I feel I am dirty now I feel ashamed now I feel guilty and believe the abuse was my fault now
15DP1 17DP2 19DP3	<b>Disrespect of authority</b> I was angry at everyone in authority then I liked people in authority then (-) I respected everyone in authority then (-)	16DC1 18DC2 20DC3	<b>Disrespect of authority</b> I am angry with everyone in authority now I like people in authority now (-) I respect everyone in authority now (-)
49XP1 51XP2 53XP3 55XP4	<b>PAST RE-ENACTMENT</b> <b>Re-enactment</b> I felt the urge to attack or abuse other people then I hurt other people then I felt the urge to harm or injure myself then I harmed or injured myself then	50XC1 52XC2 54XC3 56XC4	<b>PRESENT RE-ENACTMENT</b> <b>Re-enactment</b> I feel the urge to attack or abuse other people now I hurt other people now I feel the urge to harm or injure myself now I harm or injure myself now
39PP2 41PP3	<b>Powerlessness</b> I believed that my life was controlled by others then I thought I could do nothing to change my situation then	40PC2 42PC3	<b>Powerlessness</b> I believe that my life is controlled by others now I think I can do nothing to change my situation now
71COP3 91CDP1 93CDP2	<b>Coping by opposing</b> I planned revenge on my abusers then <b>Coping by alcohol, drugs and food</b> I drank alcohol to cope then I took other drugs to cope then	72COC3 92CDC1 94CDC2	<b>Coping by opposing</b> I am planning revenge on my abusers now <b>Coping by alcohol, drugs and food</b> I drink alcohol to cope now I take other drugs to cope now

ITEM CODE	PAST VERSION	ITEM CODE	PRESENT VERSION
21RP1 23RP2 25RP3 27RP4	<p><b>PAST SPIRITUAL DISENGAGEMENT.</b>  <b>Religious Disengagement</b>            I had faith in God then (-)            I had faith in the church then (-)            I stopped praying then            I only went mass then because I would be punished if I did not to</p>	22PC1 24RC2 26RC3 28RC4	<p><b>PRESENT SPIRITUAL DISENGAGEMENT.</b>  <b>Religious Disengagement</b>            I have faith in God now (-)            I have faith in the church now (-)            I do not pray now            I do not go to mass now</p>
57CSP1	<p><b>Coping through spiritual support</b>            I prayed to God then, and that made the abuse bearable (-)</p>	58CSPC1	<p><b>Coping through spiritual support</b>            I pray to God now, and that makes the abuse bearable (-)</p>
85CLP1  87CLP2 89CLP3	<p><b>PAST POSITIVE COPING.</b>  <b>Coping through planning</b>            Then I planned each day very carefully to avoid abuse and make good things happen (like having a laugh, getting well fed, and keeping warm)            When I was leaving school I followed a plan to get a job that would suit me and make my situation better            When I was settling down with my partner, I waited for at least 6 months to make sure we were well suited to live together</p>	86CLC1  88CLC2 90CLC3	<p><b>PRESENT POSITIVE COPING</b>  <b>Coping through planning</b>            Now I plan each day very carefully to avoid bad feelings and make good things happen (like having a laugh, getting well fed, and keeping warm)            Now I still follow a plan to make sure my job suits me and makes my situation better            When my partner and I are planning something important we take time to plan it very carefully</p>
79CMP1 81CMP2 83CMP3	<p>Coping through skill mastery            I put my energy into my school work and that made me feel better then            I put my energy into sports or music and that made me feel better then            I put my energy into a skill that I could do well that made me feel better then</p>	80CMC1 82CMC2 84CMC3	<p>Coping through skill mastery            I put my energy into my work and that makes me feel better now            I put my energy into sport or music and that makes me feel better now            I put my energy into a skill that I can do well that makes me feel better now</p>
73CTP1	<p>Coping through social support            I had a good friendship with a close friend I could trust and this made the abuse bearable then</p>	74CTC1	<p>Coping through social support            I have a good friendship with a close friend I can trust and this made the abuse bearable now (This friend is not my partner, husband or wife)</p>
75CTP2	<p>I had a good friendship with an adult I could trust and this made the abuse bearable then</p>	76CTC2	<p>I have a good friendship with a person I trust and look up to and this makes the abuse bearable now (this could be doctor or counsellor but not a partner)</p>
77CTP3	<p>I reminded my self that my mother or father was still alive, cared about me, and this made the abuse bearable then</p>	78CTC3	<p>I have a good relationship with my partner who I know cares about me and who I can tell my troubles to now and this makes the abuse bearable ( A partner is a wife /husband/ cohabitee /lover)</p>

ITEM CODE	PAST VERSION	ITEM CODE	PRESENT VERSION
61CCP1	<p><b>PAST COPING BY COMPLYING</b>  <b>Coping by complying</b>            I tried to behave well for the teachers /nuns /brothers /priests so I would not be punished then            I was careful never to break a rule then</p>	62CCC1	<p><b>PRESENT COPING BY COMPLYING</b>  <b>Coping by complying</b>            I try to behave well and fit in with people at work and in my family now to avoid conflict and arguments            I am careful never to break a rule now</p>
63CCP2 65CCP3	<p>I was careful always to show respect to the brothers, priests, nuns and teachers then (even if I didn't feel respect)</p>	66CCC3	<p>I am careful always to show respect to people in authority now (even if I do not feel respect)</p>
43AP1 45AP2 47AP3	<p><b>PAST AVOIDANT COPING</b>  <b>Avoidance of reminders of abuse</b>            I avoided thinking about the abuse then            I avoided situations that reminded me of abuse then            I avoided people who reminded me of the abuse then</p>	44AC1 46AC2 48AC3	<p><b>PRESENT AVOIDANT COPING</b>  <b>Avoidance of reminders of abuse</b>            I avoid thinking about the abuse now            I avoid situations that reminded me of abuse now            I avoid people who remind me of the abuse now</p>

**Note:** Headings in bold lowercase are the names of IAPCI rational scales containing the items beneath them. Headings in bold uppercase are the name of the six factor scales supported by confirmatory factor analyses.

Table 6.2. Factor loadings for confirmatory factor analysis of the past and present forms of the Institutional Abuse Processes and Coping Inventory

Item	Past version					Present version							
	Trauma	Reinact	Disengag	PosCope	ComCope	AvCope	Item	Trauma	Reinact	Disengag	PosCope	ComCope	AvCope
TP1	0.62						TC1	0.56					
TP2	0.52						TC2	0.70					
TP3	0.62						TC3	0.72					
TP4	0.73						TC4	0.77					
BP1	0.04						BC1	0.41					
BP2	0.56						BC2	0.65					
BP3	0.43						BC3	0.52					
SP1	0.60						SC1	0.65					
SP2	0.56						SC2	0.52					
SP3	0.65						SC3	0.61					
SP4	0.37						SC4	0.37					
DP1	0.46						DC1	0.60					
DP2	0.19						DC2	0.42					
DP3	0.14						DC3	0.30					
XP1		0.55					XC1	0.42	0.42				
XP2		0.31					XC2	0.47	0.47				
XP3		0.46					XC3	0.79	0.79				
XP4		0.33					XC4	0.71	0.71				
PP2		0.19					PC2	0.46	0.46				
PP3		0.09					PC3	0.35	0.35				
COP3		0.59					COC3	0.28	0.28				
CDP1		0.57					CDC1	0.34	0.34				
CDP2		0.41					CDC2	0.40	0.40				
RP1			0.83				RC1			0.42			
RP2			0.77				RC2			0.47			
RP3			0.35				RC3			0.79			
TP4			0.33				TC4			0.71			
CSP1			0.51				CSPC1			0.46			
CLP1				0.38			CLC1				0.35		
CLP2				0.53			CLC2				0.49		
CLP3				0.32			CLC3				0.49		
CMP1				0.43			CMC1				0.61		
CMP2				0.51			CMC2				0.51		
CMP3				0.52			CMC3				0.60		



Item	Past version						Present version						
	Trauma	Reinact	Disengag	PosCope	ComCope	AvCope	Item	Trauma	Reinact	Disengag	PosCope	ComCope	AvCope
CTP1				0.16			CTC1				0.21		
CTP2				0.30			CTC2				0.17		
CTP3				0.39			CTC3				0.32		
CCP1					0.68		CCC1					0.67	
CCP2					0.78		CCC2					0.60	
CCP3					0.57		CCC3					0.41	
AP1						0.45	AC1						0.34
AP2						0.73	AC2						0.77
AP3						0.74	AC3						0.68

Note. N=247. Trauma=Traumatization; Reinact= Re-enactment; Disengag= Spiritual Disengagement; PosCope=Positive Coping; ComCope=Coping by Complying; AvCope=Avoidant Coping.

Table 6.3. Factor correlations for confirmatory factor analysis of the past and present forms of the Institutional Abuse Processes and Coping Inventory

Scale	Past version						Present version						
	Trauma	Reinact	Disengag	PosCope	ComCope	AvCope	Scale	Trauma	Reinact	Disengag	PosCope	ComCope	AvCope
Reinact	<b>.39</b>	1.00					Reinact	.58	1.00				
Disengag	.05	.07	1.00				Disengag	.17	.11	1.00			
PosCope	.05	<b>.33</b>	<b>-.30</b>	1.00			PosCope	-.28	-.29	-.27	1.00		
ComCope	.24	-.06	-.21	.09	1.00		ComCope	.19	.04	-.13	<b>.32</b>	1.00	
AvCope	<b>.35</b>	<b>.33</b>	.02	<b>.30</b>	.07	1.00	AvCope	<b>.38</b>	.17	.02	.12	.25	1.00

Note. N=247. Trauma=Traumatization; Reinact=Re-enactment; Disengag= Spiritual Disengagement; PosCope=Positive Coping; ComCope=Coping by Complying; AvCope=Avoidant Coping. Correlations significant at  $p < .01$  and greater than an absolute value of .3 are in bold.



**Table 6.4. Reliability of 6 factor scales from past and present versions of the Institutional Abuse Processes and Coping Inventory**

<b>Instrument</b>	<b>Constructs and variables</b>	<b>No. of items in the scale</b>	<b>Possible range</b>	<b>M</b>	<b>SD</b>	<b>Internal consistency Reliability Alpha</b>	<b>Inter-rater reliability</b>
<b>IAPCI-Past version</b>	Traumatization	14	1-5	4.19	0.65	.75	.97
	Re-enactment	9	1-5	2.50	0.70	.62	.95
	Spiritual disengagement	5	1-5	2.93	0.78	.69	.80
	Positive coping	9	1-5	2.43	0.82	.62	.99
	Coping by complying	3	1-5	4.58	0.78	.71	.51
	Avoidant coping	3	1-5	3.90	1.24	.59	.91
<b>IAPCI-Present version</b>	Traumatization	14	1-5	3.23	0.89	.87	.90
	Re-enactment	9	1-5	1.69	0.67	.70	.94
	Spiritual disengagement	5	1-5	3.22	0.80	.78	.85
	Positive coping	9	1-5	3.11	0.89	.68	.96
	Coping by complying	3	1-5	3.66	1.06	.56	.98
	Avoidant coping	3	1-5	3.65	1.15	.51	.98

**Note.** N=247.

**Table 6.5. Correlations between IAPCI scales and adverse institutional living experiences**

	IAPCI Scales	Years in Institution	SPSA-I Total severe institutional abuse	SPSA-I Severe institutional physical abuse	SPSA-I Severe institutional sexual abuse	IAS Specific Institutional abuse	CTQ-I Total	CTQ-I Physical abuse	CTQ-I Sexual abuse	CTQ-I Emotional abuse	CTQ-I Physical neglect	CTQ-I Emotional neglect
<b>Past</b>	Traumatization	.05	.26	<b>.32</b>	.11	<b>.42</b>	<b>.47</b>	<b>.45</b>	.12	<b>.59</b>	<b>.38</b>	.09
	Re-enactment	-.06	<b>.40</b>	.19	<b>.39</b>	<b>.37</b>	<b>.39</b>	<b>.31</b>	<b>.35</b>	.28	.15	.06
	Spiritual disengagement	-.08	.21	.19	.14	.23	.21	.24	.10	.17	.16	.02
	Positive coping	-.24	-.13	-.23	.00	.12	-.07	.02	.04	-.03	-.09	-.26
	Coping by complying	-.09	-.16	-.06	-.17	-.02	-.09	-.01	-.14	-.01	-.04	-.03
<b>Present</b>	Avoidant coping	-.05	.09	.01	.11	.18	.14	.13	.10	.15	.03	.00
	Traumatization	.11	<b>.30</b>	.27	.20	.29	<b>.41</b>	<b>.32</b>	.23	<b>.38</b>	.23	.13
	Re-enactment	.04	.24	.10	.24	.10	.27	.13	.28	.15	.13	.04
	Spiritual disengagement	-.03	.15	.04	.17	.15	.22	.15	.15	.16	.21	.01
	Positive coping	-.09	-.08	-.11	-.03	.13	-.04	-.01	.00	.03	.04	-.21
Coping by complying		-.10	-.17	-.12	-.14	-.00	-.10	-.11	-.14	-.02	-.01	-.05
	Avoidant coping	.01	.08	.06	.06	.19	.13	.12	.07	.22	.04	-.08

**Note:** N=247. Pearson correlations significant at p<.01 and greater than an absolute value of .3 are in bold. CTQ-I=Childhood Trauma Questionnaire, institutional version (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A Retrospective Self-report*. Manual. San Antonio, TX: The Psychological Cooperation). IAS=Institutional abuse scale. SPSA=Most severe forms of physical and sexual abuse, intuition version. IAPCI=Institutional Abuse Processes and Coping Inventory.

Table 6.6. Correlations between IAPCI scales and child abuse and neglect within the family

IAPCI Scales	Years living with family before 16y N=246	SPSA-F Total severe family abuse N=121	SPSA-F Severe family physical abuse N=121	SPSA-F Severe family sexual abuse N=121	CTQ-F Total N=121	CTQ-F Physical abuse N=121	CTQ-F Sexual abuse N=121	CTQ-F Emotional abuse N=121	CTQ-F Physical neglect N=121	CTQ-F Emotional neglect N=121
<b>Past</b>	Traumatization	.04	.01	.07	.05	.01	.07	.13	.02	-.08
	Re-enactment	.01	.06	-.10	.01	.07	-.07	-.12	.01	-.00
	Spiritual disengagement	-.02	-.03	.01	-.05	-.01	.00	-.08	-.12	-.02
	Positive coping	.17	-.14	-.06	-.15	-.23	-.03	-.13	-.10	-.18
	Coping by complying	-.04	-.14	-.25	-.13	-.22	-.19	-.14	-.01	-.10
Avoidant coping	-.22	-.13	.07	.05	-.02	.10	.05	.02	.02	.04
<b>Present</b>	Traumatization	.14	.09	.16	.27	.17	.18	.29	.18	.21
	Re-enactment	-.22	.10	.07	.16	.16	.06	.14	.13	.10
	Spiritual disengagement	-.12	.10	-.04	.08	.13	-.06	.10	.03	.01
	Positive coping	.04	-.16	-.03	-.07	-.08	-.03	-.01	-.09	-.07
	Coping by complying	-.09	-.09	.08	.10	.04	.11	.13	.13	.02
Avoidant coping	-.26	.40	.05	.13	.11	.09	.13	.08	.08	

**Note:** Pearson correlations significant at  $p < .01$  and greater than .3 are in bold. CTQ-F=Childhood Trauma Questionnaire, family version (Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A Retrospective Self-report*. Manual. San Antonio, TX: The Psychological Cooperation). SPSA-F=Most severe forms of physical and sexual abuse, family version. IAPCI=Institutional Abuse Processes and Coping Inventory.

**Table 6.7. Correlations between IAPCI scales and indices of adult adjustment**

	IAPCI Scales	Total number of current and lifetime psychological disorders N=247	LPC Total number of life problems N=247	GAF Global Functioning N=235	Total trauma symptoms on TSI N=247	SES N=241	Number of failed relationships N=217	KMS Marital satisfaction N=136	ECRI Anxiety N=247	ECRI Avoidance N=247	KPS Parental satisfaction N=212	WHOOOL 100 UK Total QoL N=247
<b>Past</b>	Traumatization	.19	.10	-.15	<b>.32</b>	-.08	.04	.01	.24	.12	.04	-.21
	Re-enactment	.19	<b>.50</b>	-.18	<b>.40</b>	-.13	-.02	.05	.20	.19	.12	-.23
	Spiritual disengagement	.01	.10	-.03	.10	-.02	.04	-.05	.06	.01	-.05	-.05
	Positive coping	-.05	.03	.15	-.03	.13	-.05	.14	-.03	-.19	.16	.19
	Coping by complying	-.01	-.03	-.10	.07	.01	.03	-.09	.07	-.02	-.05	-.01
Avoidant coping	.14	-.08	-.09	.09	-.08	-.06	.07	.11	.06	.08	.03	
<b>Present</b>	Traumatization	<b>.32</b>	.18	<b>-.38</b>	<b>.64</b>	-.06	.09	-.20	<b>.44</b>	<b>.30</b>	-.07	<b>-.57</b>
	Re-enactment	<b>.32</b>	<b>.39</b>	<b>-.44</b>	<b>.63</b>	-.09	.15	-.10	<b>.34</b>	.16	-.17	<b>-.57</b>
	Spiritual disengagement	.09	.11	-.25	.20	-.11	.07	-.08	.06	.14	-.02	-.19
	Positive coping	.03	-.04	.14	-.07	.14	-.16	<b>.30</b>	.04	-.26	.08	<b>.36</b>
	Coping by complying	-.01	-.17	.01	.01	-.16	-.08	-.01	.09	-.09	.10	-.03
Avoidant coping	.17	.09	-.19	.23	.02	-.02	-.02	-.07	.16	.12	.00	-.15

**Note:** Pearson correlations significant at  $p < .01$  and greater than .3 are in bold. LPC=Life problems checklist. GAF=Global assessment of functioning scale (Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407-417). TSI=Trauma Symptom Inventory (Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources). SES=Socio Economic Status (O'Hare, A., Whelan, C.T., & Commins, P. (1991). The development of an Irish census-based social class scale. *The Economic and Social Review*, 22, 135-156). KMS=Kansas Marital Satisfaction Scale (Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387). ECRI=Experiences in Close Relationships Inventory (Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press). KPS=Kansas Parenting Satisfaction Scale (James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Shectman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169. WHOOOL 100 UK= World Health Organization Quality of Life 100 UK (Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath).

Table 6.8. Scale scores from past and present versions of the IAPCI of 4 groups of participants who had spent different amounts of time in institutions and entered under different circumstances.

		Group 1 12+y N=110	Group 2 5-11y Fam N=67	Group 3 5-11y Court N=22	Group 4 <4y N=48	One way ANOVA		4X2 ANOVA		
						F	Group Diffs	Groups X Time	Time	Groups
<b>Past traumatization</b>	M SD	4.23 0.59	4.17 0.70	3.86 0.92	4.19 0.49	2.26	NS	2.07	213.60***	1.49
<b>Present traumatization</b>	M SD	3.30 0.90	3.29 0.91	3.10 0.76	3.02 0.90	1.36	NS			
<b>Past re-enactment</b>	M SD	2.42 0.62	2.50 0.78	2.76 0.76	2.56 0.70	1.62	NS	0.81	187.41***	1.07
<b>Present re-enactment</b>	M SD	1.70 0.65	1.65 0.62	1.80 0.70	1.67 0.75	0.27	NS			
<b>Past spiritual disengagement</b>	M SD	2.88 0.76	2.91 0.86	2.89 0.63	3.09 0.78	0.85	NS	0.74	17.59***	0.38
<b>Present spiritual disengagement</b>	M SD	3.19 0.84	3.20 0.77	3.37 0.78	3.22 0.78	0.31	NS			
<b>Past positive coping</b>	M SD	2.22 0.72	2.53 0.75	2.89 0.99	2.59 0.93	5.79**	3>2>1	3.41	79.91***	2.88*
<b>Present positive coping</b>	M SD	3.03 0.90	3.15 0.77	3.07 1.15	3.26 0.90	0.79	NS			
<b>Past coping by complying</b>	M SD	4.53 0.85	4.61 0.74	4.56 0.68	4.63 0.76	0.19	NS	0.40	120.86***	0.81

			Group 1 12+y N=110	Group 2 5-11y Fam N=67	Group 3 5-11y Court N=22	Group 4 <4y N=48	One way ANOVA		4X2 ANOVA		
							F	Group Diffs	Groups X Time	Time	Groups
<b>Present coping by complying</b>	M SD		3.58 1.09	3.78 1.03	3.48 0.99	3.78 1.06	0.92	NS			
<b>Past avoidant coping</b>	M SD		3.82 1.28	4.18 1.02	3.52 1.51	3.90 1.18	2.11	NS	0.43	7.81**	2.08
<b>Present avoidant coping</b>	M SD		3.61 1.11	3.78 1.14	3.29 1.34	3.71 1.16	1.08	NS			

**Note:** Group 1 spent more than 12 years in an institution and entered before age 5. Group 2 spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. Group 3 spent 5-11 years in an institution and placement occurred through the courts. Group 4 spent 4 or fewer years in institutions. To aid profiling all scales have a possible range of 1-5 which was obtained for each scale by summing items and dividing by the number of items. One-way ANOVAs were used to compare groups on either past or present versions of each scale and Scheffe post hoc tests for comparing groups with unequal Ns were used to identify significant ( $p < .05$ ) intergroup differences. 4X2, Groups X Time repeated measures ANOVAs were used to test the significance of changes from past to present on each scale. \* $p < .05$ . \*\* $p < .01$ . \*\*\* $p < .001$ .

Table 6.9. Scale scores from past and present versions of the IAPCI of 4 groups of participants who reported different types of worst abusive experiences in institutions.

							One way ANOVA		4X2 ANOVA			
							F	Group Diffs	Groups X Time	Time	Groups	
				<b>Group 1</b> <b>P+S</b> <b>N=23</b>	<b>Group 2</b> <b>P</b> <b>N=99</b>	<b>Group 3</b> <b>S</b> <b>N=40</b>	<b>Group 4</b> <b>E</b> <b>N=85</b>					
<b>Past traumatisation</b>	M SD	4.45 0.52	4.19 0.65	4.19 0.78	4.11 0.60	1.68	NS	0.45	209.81***		2.74*	
<b>Present traumatisation</b>	M SD	3.58 0.80	3.29 0.88	3.21 0.88	3.07 0.92	2.20	NS					
<b>Past re-enactment</b>	M SD	2.93 0.70	2.43 0.62	2.76 0.80	2.34 0.66	7.07***	1,3>2,4	1.70	199.26***		5.81**	
<b>Present re-enactment</b>	M SD	1.91 0.60	1.67 0.66	1.76 0.81	1.62 0.60	1.33	NS					
<b>Past spiritual disengagement</b>	M SD	3.17 0.68	2.95 0.80	3.02 0.77	2.80 0.78	1.75	NS	0.19	15.70***		2.38	
<b>Present spiritual disengagement</b>	M SD	3.41 0.78	3.19 0.78	3.37 0.77	3.12 0.85	1.37	NS					
<b>Past positive coping</b>	M SD	2.24 0.74	2.42 0.78	2.66 1.04	2.40 0.76	1.47	NS	0.37	111.99***		1.85	
<b>Present positive coping</b>	M SD	2.99 0.83	3.13 0.81	3.34 1.01	3.01 0.93	1.45	NS					
<b>Past coping by complying</b>	M SD	4.39 1.07	4.74 0.47	4.38 0.95	4.54 0.87	2.83*	2>3	1.30	116.27***		5.86**	

		Group 1 P+S N=23	Group 2 P N=99	Group 3 S N=40	Group 4 E N=85	One way ANOVA		4X2 ANOVA	
						F	Group Diffs	Groups X Time	Time
<b>Present coping by complying</b>	M SD	3.61 0.76	3.96 0.89	3.38 1.15	3.46 1.18	4.89**	2>4>3		
<b>Past avoidant coping</b>	M SD	4.46 0.84	3.91 1.30	3.87 1.32	3.78 1.16	1.94	NS	0.44	8.88**
<b>Present avoidant coping</b>	M SD	4.03 1.02	3.69 1.17	3.74 1.11	3.45 1.16	1.85	NS		2.45

**Note:** Group 1 contained 23 cases where the worst thing reported was severe physical and sexual abuse. Group 2 contained 99 cases where the worst thing they had experienced was severe physical abuse. Group 3 contained 40 cases where the worst thing they had experienced was severe sexual abuse. Group 4 contained 85 cases where the worst thing they had experienced was severe emotional abuse. Participant's statements were classified as severe physical abuse if the person reported physical violence, beating, slapping, or being physically injured, but not having medical attention withheld. Statements were classified as severe sexual abuse if the person reported the words sexual abuse or mentioned rape; genital, anal or oral sex; masturbation; or other coercive sexual activities involving either staff or older pupils. Statements were classified as severe physical and sexual abuse if they involved both severe physical abuse and severe sexual abuse as defined earlier. Statements of actions involving humiliation, degradation, severe lack of care, withholding medical treatment, witnessing the traumatization of other pupils and severe sexual abuse that were not clearly classifiable as severe sexual or physical abuse were classified as severe emotional abuse. Inter-rater agreement greater than 90% was achieved for a sample of 10% of statements. To aid profiling all scales have a possible range of 1-5 which was obtained for each scale by summing items and dividing by the number of items. One-way ANOVAs were used to compare groups on either past or present versions of each scale and Scheffe post hoc tests for comparing groups with unequal Ns were used to identify significant ( $p < .05$ ) intergroup differences. 4X2, Groups X Time repeated measures ANOVAs were used to test the significance of changes from past to present on each scale. \* $p < .05$ . \*\* $p < .01$ . \*\*\* $p < .001$ .



Table 6.10. Scale scores from past and present versions of the IAPCI of 3 groups of participants who had different numbers of psychological diagnoses.

		Group 1 4+ Diagnoses N=83	Group 2 1-3 Diagnoses N=119	Group 3 0 Diagnoses N=45	One way ANOVA			3X2 ANOVA	
					F	Group Diffs	Groups X Time	Time	Groups
Past traumatization	M SD	4.39 0.52	4.16 0.63	3.90 0.78	9.39***	1>2,3	9.19***	297.35***	29.82***
Present traumatization	M SD	3.73 0.68	3.12 0.83	2.60 0.91	30.91***	1>2>3			
Past re-enactment	M SD	2.87 0.78	2.35 0.57	2.21 0.57	21.74***	1>2,3	1.58	214.63***	61.31***
Present re-enactment	M SD	2.16 0.75	1.53 0.49	1.23 0.32	48.90***	1>2>3			
Past spiritual disengagement	M SD	3.01 0.77	2.86 0.78	2.95 0.80	0.87	NS	1.12	14.16***	1.05
Present spiritual disengagement	M SD	3.29 0.75	3.22 0.78	3.06 0.95	1.28	NS			
Past positive coping	M SD	2.31 0.90	2.49 0.76	2.52 0.81	1.57	NS	3.10*	113.41***	4.31*
Present positive coping	M SD	2.88 0.89	3.31 0.85	3.01 0.91	6.14**	1<2			
Past coping by complying	M SD	4.64 0.73	4.54 0.80	4.56 0.84	0.38	NS	2.49	140.28***	0.31
Present coping by complying	M SD	3.50 1.01	3.73 1.08	3.78 1.06	1.48	NS			

			Group 1 4+ Diagnoses N=83	Group 2 1-3 Diagnoses N=119	Group 3 0 Diagnoses N=45	One way ANOVA		3X2 ANOVA	
						F	Group Diffs	Groups X Time	Time
<b>Past avoidant coping</b>	M	3.94	3.99	3.62	1.52	NS	1.11	11.43**	3.97*
	SD	1.32	1.15	1.22					
<b>Present avoidant coping</b>	M	3.82	3.70	3.17	5.14**	1>3			
	SD	1.10	1.06	1.35					

**Note:** Group 1 had four or more current or lifetime diagnoses as assessed with the SCID I (First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-I)*. Washington, DC: American Psychiatric Press) and SCID II (First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders, (SCID-II)*. Washington, DC: American Psychiatric Press). Group 2 had 1-3 current or lifetime diagnoses. Group 3 had no diagnoses. To aid profiling all scales have a possible range of 1-5, which was obtained for each scale by summing items and dividing by the number of items. One-way ANOVAs were used to compare groups on either past or present versions of each scale and Scheffe post hoc tests for comparing groups with unequal Ns were used (except where otherwise stated) to identify significant ( $p<.05$ ) inter-group differences except for 3X2, Groups X Time repeated measures ANOVAs were used to test the significance of changes from past to present on each scale. \* $p<.05$ . \*\* $p<.01$ . \*\*\* $p<.001$ .

Table 6.11. Fit indices for the model of institutional abuse

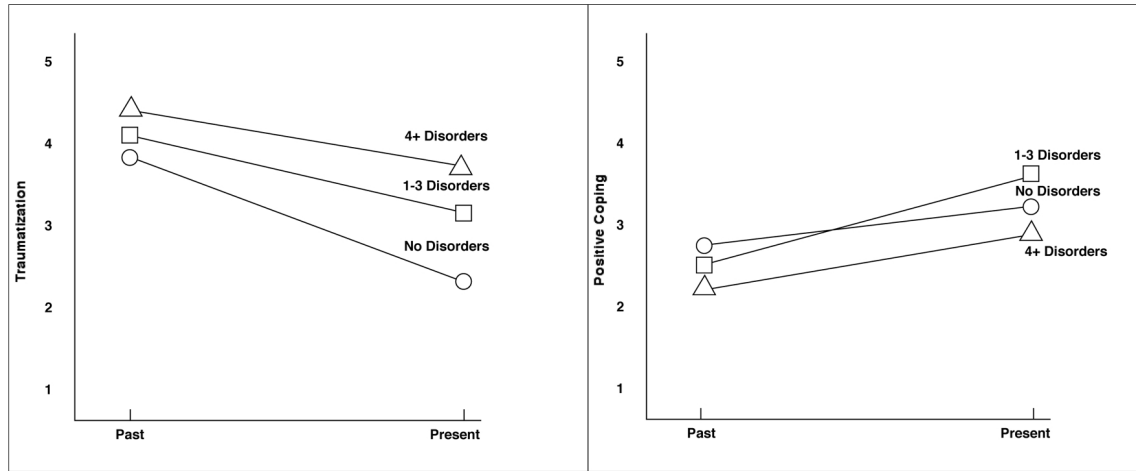
Index	Model
$\chi^2$ df p RMSEA - Root Mean Square Error of Approximation 90% Confidence Interval IFI - Incremental Fit Index CFI - Comparative Fit Index SRMR - Standardized Root-Mean-Square Residual GFI - Goodness of fit index	31.25 11 .00 .08 (.05-.12) .96 .97 .07 .97

Table 6.12. Standardised regression coefficients from the model of institutional abuse.

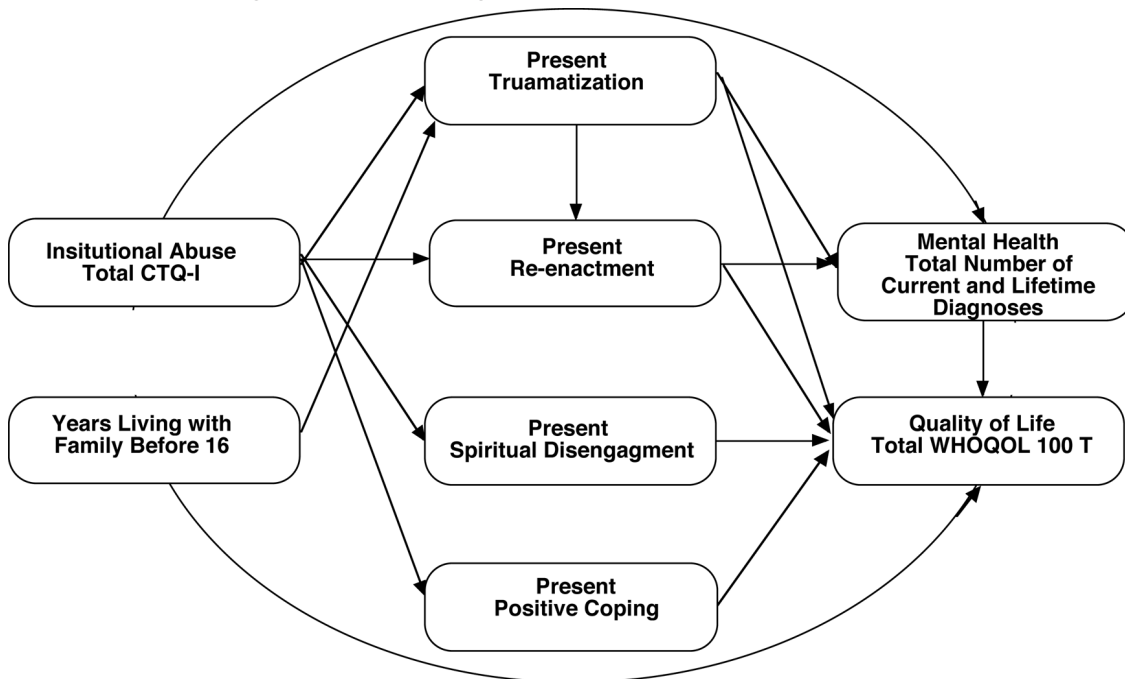
	Total CTQ-I	Years living with family before 16	Present traumatization	Present re-enactment	Present spiritual disengagement	Present positive coping	Total current and lifetime diagnoses
Traumatization	.38*	-.22*	.63*				
Re-enactment	.11						
Spiritual Disengagement	-.07	.15	.00	.59*			
Positive Coping	-.07						
Total Current and Present Diagnoses	.15*	-.02	-.19*	-.34*	.03	.31*	-.26*
Total WHO-QoL 100							

Note: \*p<.05

**Figure 6.1. Changes in traumatization and positive coping from past to present in three groups of survivors of institutional living with differing numbers of psychological disorders.**



**Figure 6.2. A path diagram of the model of institutional abuse**



## Part 7 Conclusions

**3.341** Past research on child abuse, institutional living, institutional abuse and clerical abuse suggests that children brought up in institutions and abused as children may show a range of problems as adults. These include anxiety, mood, substance use and personality disorders, relationship and parenting problems, occupational and health difficulties, self-harm and an impoverished quality of life, as detailed in Part 1. The negative effects of such early adversity is probably related to the variety, severity, frequency, and duration of abusive experiences. The long-term outcomes of child abuse may be mediated by critical psychological processes such as traumatization, betrayal, disrespect for authority, stigmatization, powerlessness, avoidance of reminders of trauma and re-enactment of negative experiences on self or others. If the negative childhood experiences occur within the context of a religious institution, religious disengagement may also occur. The negative effects of adversity may be attenuated by the use of functional coping strategies such as developing social support, mastering skills, and effectively planning escape from adversity. In

contrast, the adverse effects of negative experiences may be exacerbated by the use of dysfunctional coping strategies such as overcompliance. However, in Ireland no large-scale studies have been conducted to investigate whether or not these tentative findings from the international literature reflect the experiences of survivors of institutional living in Ireland.

### ***Aims of the current study***

- 3.342** The overarching aim of the present study was to profile subgroups of adult survivors of institutional child abuse on demographic, historical and psychological variables with a view to detecting associations between recollections of institutional living and current adjustment. In particular the aim was to profile subgroups of survivors defined by: (1) the number of years spent in institutions and the circumstances under which admission occurred; (2) the worst type of institutional abuse experienced; and (3) the number and type of psychological disorders displayed. An additional aim was to develop a way to assess psychological processes and coping strategies associated with institutional abuse, and establish the correlates of these processes and coping strategies.

### ***Methodology***

- 3.343** Between May 2005 and February 2006 just under 250 adult survivors of institutional living recruited through CICA were interviewed in Ireland and the UK by a team which included 29 trained interviewers, all of whom had degrees in psychology. The overall exclusion rate was 26% (326 of 1267). The participation rate was 20% (246 of 1267). The response rate for the study was 26% (246 of 941). (This low response rate is not unusual. A response rate of 9% was obtained in the *Time to Listen Report on Confronting Child Sexual Abuse by Catholic Clergy* (Goode, McGee & O'Boyle, 2003)).

- 3.344** The sample of participants interviewed was not representative of all CICA attenders, or indeed of adult survivors of institutional living. It is probable that participants were better adjusted than CICA attenders who did not take part, because the old and the ill were excluded from the study. The interview protocol covered demographic characteristics, history of family and institutional living, recollections of child abuse within the family and institutions, psychological processes associated with institutional life, coping strategies used to deal with institutional life, current trauma symptoms, current and past diagnoses of psychological and personality disorders, relationships with partners and children, adult attachment style, main life problems, current quality of life, and global level of functioning. Interviews were conducted in an ethical way that safeguarded participants' wellbeing. Data were managed in a way to safeguard participants' anonymity.

### ***Summary of main results***

#### ***Profile of overall sample***

- 3.345** **Demographic characteristics.** The 247 participants in this study included roughly equal numbers of men and women of about 60 years of age, who had entered institutions run by nuns or religious brothers due to family adversity or petty criminality. Participants had spent an average of 5.4 years living with their families before entering an institution and on average spent 10 years living in an institution. The majority were of lower socioeconomic status and low educational attainment. The majority had been, or were currently married or in a long-term relationships, with a high rate of relationship stability. Most married participants had children, with three children being the average, and most had brought up their own children.

- 3.346** **Institutional abuse.** On the institutional version of the Childhood Trauma Questionnaire, more than 90% of participants were classified as having experienced institutional physical and emotional child abuse and about half as having experienced institutional child sexual abuse. More than 90% were classified as having experienced physical and emotional neglect within institutions. For about 40% of participants, severe physical abuse was the worst thing that happened to them in an

institution. For a further third it was humiliation and degradation. For 16% it was sexual abuse and for about a tenth it was combined physical and sexual abuse. Worst institutional abusive experiences began at about 9 years and lasted for 5 about years.

**3.347 Family-based child abuse.** On the family version of the Childhood Trauma Questionnaire just over a third of those who had memories of having lived with their families reported family-based child abuse or neglect.

**3.348 Life problems.** All participants had experienced one or more significant life problems. Mental health problems, unemployment and substance use were the three most common difficulties and were reported by a third to three quarters of participants.

**3.349 Strengths.** Self-reliance, optimism, work and skills were the most frequently reported sources of personal strength and factors that helped participants face life challenges.

**3.350 Psychological disorders.** About four fifths of participants at some point in their life had had a psychological disorder and only a fifth had never had any psychological disorder. Anxiety disorders were the most common, followed by mood disorders, followed by substance use disorders, and personality disorders were the least common.

**3.351 Trauma symptoms.** The majority of participants showed clinically significant post-traumatic symptomatology on the Trauma Symptom Inventory, indicative of continuing post-traumatic adjustment difficulties.

**3.352 Adult attachment styles.** On the Experiences in Close Relationships Inventory more than four fifths of participants were classified as having an insecure adult attachment style, indicative of having problems making and maintaining satisfying intimate relationships. A fearful attachment style characterized by high interpersonal anxiety and avoidance was by far the most common. Less than a fifth of cases were classified as having a secure adult attachment style.

### **Comparison of CICA survivors and normal populations**

**3.353** The overall rates of psychological disorders among survivors of institutional living in the present study, were far higher, and in most cases double those found in normal community populations in major international epidemiological studies.

### **Correlates of institutional abuse**

**3.354** Institutional sexual abuse was associated with current post-traumatic symptomatology and major life problems.

### **Heterogeneity among survivors**

**3.355** Adult survivors of institutional living were not a homogenous group, and subgroups had distinctive profiles.

### **Males and females**

**3.356** Male and female participants had different profiles. Male participants spent longer living with their families before entering institutions and fewer years in institutions. More entered institutions run by religious brothers or priests for petty crime and left because their sentence was over, while more females lived in institutions run by nuns. Male participants achieved a higher SES than females and more had children who spent time living separately from them with the child's other parent. While worst abusive experiences began at an older age, for male participants, they reported more institutional sexual abuse. While female participants had significantly more current panic disorder with agoraphobia, significantly more male participants had lifetime diagnoses of



alcohol and substance use disorders, especially alcohol dependence. Male participants had significantly higher numbers of life problems, but also higher levels of global functioning and marital satisfaction than females.

### **Older and younger participants**

**3.357** Older participants in their 60s and younger participants in their 50s had distinct profiles. More older participants left their institutions because they were too old to stay on and more were now retired. They had longer relationships with their current partners and were older when their first children were born. Younger participants reported greater institutional, physical, sexual and emotional abuse. More had current anxiety, mood and personality disorders, especially PTSD, generalized anxiety disorder and avoidant personality disorder. Younger participants had more trauma symptoms, adult life problems, a lower quality of life and lower level of global functioning compared with older participants.

### **Participants from the CICA confidential and investigation committees**

**3.358** Participants from the confidential and investigation committees had distinct profiles. Participants from the confidential committee had spent fewer years with their families before entering an institution and more years in institutions run by nuns. More entered because they were illegitimate and left because they were too old to stay on. They were younger when their worst experiences began. More had maintained stable long-term relationships with their partners and provided their own children with a stable family in which to grow up. More participants from the investigation committee entered institutions run by religious brothers or priests through the courts for petty crime and left because their sentences were over. They reported greater institutional sexual abuse than participants from the confidential committee. More participants from the investigation committee had a current diagnosis of major depression.

### **Subgroups defined by duration of time in an institution and circumstances of entry**

**3.359** In the analysis of four groups of participants who had spent different amounts of time in institutions and entered under different circumstances, the most poorly adjusted as adults were not those who had spent longest living in institutions (more than 12 years), but rather those who had spent less time in institutions (under 11 years), entered institutions through the courts and reported institutional sexual abuse, in addition to physical abuse within their families. These had more anti-social personality disorders, substance use disorders and life problems such as unemployment and criminality. What follows is a summary of the profiles of the four groups from this analysis.

**3.360** **Group 1 included those who had spent more than 12 years in an institution and entered before 5 years of age.** They had spent the least time with their families (under one and a half years) and the longest time living in institutions (about fifteen years) of any of the four groups. Compared to groups 3 and 4, more were girls placed in orphanages run by nuns because they were illegitimate, or because their parents had died or could not look after them. More left because they were too old to stay on, and more had mixed feelings about leaving. More had experienced physical abuse which began at a younger age and persisted longer than in group 4. Severe emotional abuse was most commonly cited as the worst thing that happened to this group and it began at an earlier age and lasted longer than worst experiences of other groups. Compared with groups 3 and 4, this group reported fewer psychological disorders and life problems. They identified relationships with friends, self-reliance, optimism, and their work and skills as the sources of their strength.

**3.361** **Group 2 included participants who had spent 5-11 years in institutions because of family problems.** Participants in this group entered institutions run predominantly by nuns because their parents could not cope or died, and left when they were too old to stay. Compared with groups 3 and 4, more members of group 2 were female, younger when their most severe form of sexual

abuse began, and more identified severe emotional abuse as the worst thing that had happened to them. Compared with group 4 more identified self-reliance, optimism, and their work and skills as the source of their strength.

**3.362 Group 3 included participants who had spent 5-11 years in institution and entered through the courts.** Compared with groups 1 and 2, more members of this group were male, lived in institutions run by religious brothers or priests, and were survivors of institutional sexual abuse. Compared to the other three groups they identified sexual abuse as the worst thing that had happened to them, and more had experienced physical abuse within their families. Compared with groups 1 and 2, this group had more alcohol and substance use disorders, antisocial personality disorders, violent and non-violent crime, imprisonment for violent and non-violent crime, and unemployment. For this group, their self-reliance, optimism, and their work and skills were identified as the main sources of their strength in adulthood, compared with group 4.

**3.363 Group 4 included participants who had spent 4 or fewer years in institution.** Participants in this group spent the most time with their families (more than ten and a half years) and the shortest time living in an institution (just under three years) compared with the other three groups. Most were boys placed in institutions run by religious brothers or priests because of petty crime and left because their short sentences were over, or because their families wanted them back, and few had mixed feelings about leaving. Institutional sexual abuse was the form of maltreatment that distinguished this group, and compared with groups 1 and 2, they showed more alcohol and substance use disorders, antisocial personality disorders, non-violent crime, imprisonment for non-violent crime and unemployment. Their relationships with their partners was identified as the main source of their strength in adulthood.

#### **Subgroups defined by worst form of institutional abuse**

**3.364** In the analysis of groups of participants who reported suffering differing types of worst abusive experiences in institutions, the most poorly adjusted as adults were not those who reported severe combined physical and sexual abuse, but rather, those who pinpointed severe sexual abuse as the worst thing that had happened to them while living in an institution. In this analysis, the best adjusted were those who had suffered severe emotional abuse. What follows is a summary of the profiles of the four groups from this analysis.

**3.365 Group 1 included participants for whom severe sexual and physical abuse was the worst thing they had experienced.** Participants in this group had experienced more physical and sexual institutional abuse than at least two of the other 3 groups (in this analysis). They had spent less time with their families before entering an institution than group 3. Like members of group 3, more had children who spent some time living separately with the child's other parent. Compared with groups 2 and 4, more had a current diagnosis of post-traumatic stress disorder (PTSD) and multiple trauma symptoms.

**3.366 Group 2 included participants for whom severe physical abuse was the worst thing they had experienced.** Participants in this group had the lowest educational achievement, were older than groups 1 and 3 (in this analysis), and more had put their own children up for adoption. Compared with group 3, their worst abusive experience had lasted longer. Like group 4, fewer had PTSD than groups 1 and 3, and they had fewer life problems than group 3.

**3.367 Group 3 included participants for whom severe sexual abuse was the worst thing they had experienced.** Compared with group 4 (in this analysis), more participants in group 3 were male and were admitted through the courts to institutions run by religious brothers for petty crime. Like group 1, more had children who spent time with their other parent who lived separately compared

to group 4. Also, compared to group 4, more had PTSD, multiple trauma symptoms, lifetime alcohol and substance use disorders, antisocial personality disorders and multiple life problems.

**3.368 Group 4 included participants for whom severe emotional abuse was the worst thing they had experienced.** Compared to group 3 (in this analysis), more participants in this group were female and on average had spent the longer living in institutions run by nuns. Their worst experiences began at an earlier age than any other group and more had mixed feelings about leaving.

### **The association between sexual abuse and outcome**

**3.369** In the analysis of groups of participants who had spent different amounts of time in institutions and entered under different circumstances, the most poorly adjusted as adults were those who had spent a moderate amount of time in institutions and who had suffered institutional sexual abuse. In the analysis of groups of participants who reported suffering differing types of worst abusive experiences in institutions, the most poorly adjusted included those who pinpointed severe sexual abuse as the worst thing that had happened to them while living in an institution. Thus, institutional sexual abuse was associated in both analyses with a particularly poor outcome.

### **Profiles associated with patterns of adult psychological disorders**

**3.370** There was an association between having psychological disorders and reporting both institutional and family-based child abuse and neglect. Certain patterns of psychological disorders were associated with institutional abuse alone, and other patterns were associated with institutional family-based child abuse and neglect. For participants with multiple co-morbid diagnoses, and for those with mood disorders, greater institutional, but not family-based physical, sexual and emotional abuse was reported. Participants with PTSD, alcohol and substance use disorders, avoidant and antisocial personality disorder reported both institutional and family-based abuse or neglect. Participants with multiple diagnoses had the poorest adult psychological adjustment and those with no diagnoses were the best adjusted. Subgroups selected by diagnosis showed an intermediate level of adult psychological adjustment between these extremes. What follows are brief profiles of groups with different patterns or types of psychological disorders.

**3.371 Multiple comorbid diagnoses.** Participants with 4 or more diagnoses reported greater institutional sexual and emotional abuse (but not more family-based abuse) than participants with fewer diagnoses. Participants with 4 or more diagnoses had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with 1-3 diagnoses, who in turn were less well adjusted than participants with no diagnoses. More participants with 4 or more diagnoses had a fearful adult attachment style, and fewer had secure or dismissive adult attachment styles. On average more participants with 4 or more diagnoses were in their 50s compared with those with no diagnoses who were in their 60s. Also, more participants with 4 or more diagnoses were unemployed and of lower SES than participants with fewer diagnoses.

**3.372 Mood disorders.** Participants with mood disorders, more than half of whom had co-morbid anxiety disorders, reported greater institutional sexual and emotional abuse and greater institutional severe physical and sexual abuse (but not family-based child abuse) than participants with no diagnoses. Participants with mood disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. More participants with mood disorders had a fearful adult attachment style, and fewer had a secure adult attachment style. On average participants with mood disorders were in their late 50s while those with no diagnoses were in their 60s. Also, on average, participants with mood disorders had had their first child in their mid-20s, while those with no diagnoses had their first children a couple of years later.

- 3.373 Posttraumatic stress disorder.** Participants with PTSD, more than half of whom had other co-morbid anxiety disorders and alcohol or substance use disorders, reported greater institutional physical, sexual and emotional abuse, and greater institutional severe physical and sexual abuse than participants with no diagnoses. They also reported having experienced greater family-based emotional abuse. Participants with PTSD had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with no diagnoses. Fewer participants with PTSD had a dismissive adult attachment style. On average participants with PTSD were in their 50s while those with no disorders were in their 60s.
- 3.374 Alcohol and substance use disorders.** Participants with alcohol and substance use disorders, more than half of whom had a co-morbid anxiety disorder, reported greater institutional sexual and emotional abuse, and greater institutional severe sexual abuse than participants with no diagnoses. They also reported having experienced greater family-based physical and emotional abuse. Participants with alcohol and substance use disorders had more trauma symptoms and life problems, and a lower quality of life and global level of functioning than participants with no diagnoses. Compared with those with no diagnoses, participants with alcohol and substance use disorders were younger (in their 50s not their 60s); had had their first children at a younger age (in early, not their late 20s); were of lower SES; and fewer had entered an institution because their parents had died.
- 3.375 Avoidant personality disorder.** Participants with avoidant personality disorders reported greater institutional and family-based emotional abuse than those with no diagnoses. Almost all participants with an avoidant personality disorder had a co-morbid anxiety, mood or substance use disorder. Participants with avoidant personality disorder had more trauma symptoms and life problems, and a lower quality of life and global level of functioning, than participants with no diagnoses. Compared to those with no diagnoses, more participants with an avoidant personality disorder had a fearful adult attachment style and fewer had a secure adult attachment style. Compared to participants with no diagnoses, participants with avoidant personality disorder were younger (in their 50s, not their 60s) and more had been placed in institutions run by nuns because their parents could not care for them.
- 3.376 Antisocial personality disorder.** Participants with antisocial personality disorder reported greater institutional sexual abuse than participants with no diagnoses. All participants with antisocial personality disorder had co-morbid anxiety, mood or substance use disorders. Participants with antisocial personality disorder had more trauma symptoms, more life problems, a lower quality of life, a lower global level of functioning, and lower parental satisfaction than participants with no diagnoses. Compared to those with no diagnoses, participants with antisocial personality disorder were younger (in their 50s, not their 60s); had spent fewer years in institutions (5 1/2 not nearly 10 years); more were unemployed; and more were of low SES.
- 3.377 Borderline personality disorder.** Participants with borderline personality disorder and those with no diagnoses, did not differ in their reported levels of institutional or family-based child abuse, although both reported a high level of child abuse. All participants with borderline personality disorder had co-morbid anxiety, mood or substance use disorders. Participants with borderline personality disorders had more trauma symptoms, more life problems, a lower quality of life, a lower global level of functioning, and more had a fearful adult attachment style than participants with no diagnoses. Compared to those with no diagnoses, participants with borderline personality disorder were younger (in their 50s, not 60s), more were unemployed, and on average reported being abused from an earlier age.

### Changes in institutional abuse processes from childhood to adult hood

- 3.378** All participants reported a reduction in the psychological processes of traumatization and re-enactment and an increase in spiritual disengagement from childhood to adult life. The three multi-item scales developed in this study to measure these constructs were: (1) the **traumatization** scale which assessed negative emotions arising from abuse, betrayal and loss of trust, stigmatization, shame, guilt, and disrespect of authority; (2) the **re-enactment** scale which assessed re-enactment of abuse, powerlessness, coping by opposing and coping by using alcohol and drugs; and (3) the **spiritual disengagement** scale which assessed disengagement from religious practice and not using spiritual coping strategies. Two versions of these scales were developed. The first assessed participants' memories of these processes from childhood. The second assessed the current experience of these processes in adulthood.

### Changes in coping strategies from childhood to adulthood

- 3.379** Participants reported an increase in the use of positive coping strategies and a reduction in the use of coping by complying and avoidant coping strategies from childhood to adulthood. The three multi-item scales developed in this study to measure these constructs were: (1) the **positive coping** scale which assessed coping through planning, skill mastery and social support; (2) the **coping by complying** scale which assessed coping by complying with the wishes of people in authority; and (3) the **avoidant coping** scale which assessed coping by avoiding thoughts and situations associated with abuse. Two versions of these scales were developed. The first assessed participants' memories of using these coping strategies in childhood. The second assessed their current use of these coping strategies in adulthood.

### Institutional abuse and the processes of traumatization and re-enactment

- 3.380** The psychological processes of traumatization and re-enactment as experienced in adulthood or remembered from childhood were associated with multiple indices of institutional abuse, but not family-based child abuse. Participants for whom severe physical and sexual abuse, or severe sexual abuse alone were the worst things that happened to them in institutions, reported greater past re-enactment of abusive experiences, than those for whom worst experiences involved severe physical or emotional abuse.

### Adult adjustment, abuse processes and coping strategies

- 3.381** Traumatization and re-enactment as experienced in adulthood or remembered from childhood were associated multiple indices of adult adjustment including the presence of multiple trauma symptoms, multiple adult life problems, global functioning, quality of life, interpersonal anxiety and interpersonal avoidance. Participants with four or more psychological disorders reported greatest past and present traumatization and re-enactment; greatest current use of avoidant coping; and least current use of positive coping. Participants with no psychological disorders, reported least current traumatization, re-enactment and use of avoidant coping, and the greatest reduction in traumatization from childhood to adulthood. However, they showed a negligible increase in the use of positive coping strategies from childhood to adulthood, probably because they were using these strategies throughout their lives.

### Correlates of positive coping and time spent living with family

- 3.382** Positive coping in adulthood was associated with marital satisfaction and a good quality of life. Participants who spent 5-11 years in an institution and placement occurred through the courts reported greater use of positive coping strategies in childhood, than those who spent 5-11 years in an institution and placement occurred because parents couldn't cope or died. These in turn reported greater use of these strategies than participants who spent more than 12 years in an institution and entered before age 5. Time spent living with one's family in childhood was a



protective factor and was associated with reduced traumatization in adulthood, whereas severe family-based child abuse was associated with avoidant coping in adulthood.

### **Correlates of dysfunctional coping**

**3.383** Participants who reported that severe physical abuse was the worst thing that happened to them in institutions reported greatest coping by complying. Lowest levels of coping by complying occurred among those that reported that severe sexual abuse was the worst thing that happened to them in institutions. For present coping by complying, intermediate between these extremes was the group that reported that severe emotional abuse was the worst thing that happened to them in institutions.

### **A model of institutional abuse, psychological processes and adult adjustment**

**3.384** A model was developed which shows how childhood institutional abuse is associated with the processes of traumatization, re-enactment and spiritual disengagement, which in turn are associated with adult mental health and quality of life. The model also shows how childhood years within the family and current use of positive coping strategies are associated with quality of life

### **Strengths and limitations**

**3.385** This study had three main limitations: (1) there was a high exclusion rate and a low response rate; (2) there was no control group; and (3) the study used a cross-sectional not a longitudinal design. There were also four main strengths: (1) it was the largest study of its kind conducted to date; (2) an extensive reliable and valid interview protocol was used; (3) data were collected by psychologists trained in using the interview protocol and (4) in the statistical analyses, steps were taken to reduce type 1 error (interpreting non-significant results as significant)

### **High exclusion rate and low response rate**

**3.386** About a quarter of all potential participants were excluded for various practical reasons, and only about a quarter of the remaining survivors participated in the study. Because of these two factors, the group of participants was not a representative sample of either typical CICA attenders or the broader population of adult survivors of institutional living. This limits the generalizability of the results. We cannot say that an identical pattern of results would occur if all CICA attenders, or all survivors of institutional living were interviewed.

**3.387** However, we can make an informed judgment. Those, too old, or too ill, or too disabled or without fixed addresses were excluded. Thus, on balance, it is probable that the participants in the study may have been slightly better adjusted than those excluded. We have no basis on which to make a similar judgement about non-responders or survivors who did not attend CICA. They may be better or more poorly adjusted.

**3.388** It is worth commenting on the response rate within the context of other studies. The response rate for the study of adult survivors of clerical child abuse in the *Time to Listen Report on Confronting Child Sexual Abuse by Catholic Clergy* was only 9%, and only 7 survivors were interviewed face to face (Goode, McGee & O'Boyle, 2003). The response rate in our study was almost three times this, and 240 more survivors were interviewed. Within this context, although the exclusion and response rates were limitations, the current study has made a significant contribution to our knowledge about institutional abuse in Ireland.

### **No control group**

**3.389** The aim of the study was to determine if there were associations between adult adjustment and recollections of institutional abuse, an aim that could be achieved by exploring profiles of subgroups and correlations between variables within a single group cross-sectional design.

**3.390** However, a more powerful design involving a demographically matched control group, members of which had grown up in families (not institutions), would have allowed other important questions to be answered. For example, a control group design would have allowed us to answer questions about whether rates of psychological disorders and levels of life problems, quality of life and so forth were different in survivors and matched normal controls. Such a study would have been beyond the resources available for the investigation, and no such studies have been published in the Irish or international scientific literature.

**3.391** In an attempt to overcome some of the limitations of a single group study, we included some standardized assessment instruments for which normative data were available, such as the Childhood Trauma Questionnaire and the Trauma Symptom Checklist and data from epidemiological studies of normal populations. Using the norms for standardized instruments we could conclude that across a range of trauma symptom scales 12-59% of cases scored above clinical cut-off scores of a normative group; over 90% of cases scored above cut-off scores of a normative group for physical and emotional child abuse; and just under 50% scored above the cut-off score of a normative group for child sexual abuse. Data from major international epidemiological studies allowed us to conclude that the prevalence of current anxiety, mood and personality disorders among participants in our study was more than twice that found in normal European, North American or British populations; and the prevalence of lifetime diagnoses of anxiety, mood, and substance use among our participants exceeded those found in normal European, North American or British populations by between 5 and 30%.

### **Cross-sectional design**

**3.392** We used a cross-sectional design, with all variables being assessed at one point in time. This design has major limitations. Where two variables are found to correlate significantly or where two groups are found to differ significantly on a variable, the strongest inference that can validly be made is that variables in these statistical analyses are associated. We cannot validly infer causality. That is, we cannot say, for example, that institutional abuse caused adult adjustment problems. To make such an inference, a longitudinal design is required, in which cases abused in institutions and a normal control group are assessed before the onset of the abuse, and later in life. Such a design was clearly not viable. From our cross-sectional design, all that can be concluded is that some of the variables that assessed abuse and some of the variables that assessed adult adjustment were associated. Furthermore, there are at least three possible explanations that could account for this association. The abusive experiences may have caused the adjustment problems. Another possibility is that adults with adjustment problems selectively and inadvertently over-reported abusive experiences. A third possibility, is that some other factor of which we are unaware, caused both the reporting of abusive experiences and the reporting of adult adjustment problems.

**3.393** Our informed judgement, in which we have a moderate degree of confidence, is that the abusive experiences caused the adult adjustment problems. But of course, we are cautious about making a definitive statement in this regard. Our confidence is based partly on the similarity between our findings and those from the large international literature on child abuse referred to in Part 1 (Berliner & Elliott, 2002; Carr, 2006; Carr & O'Reilly, 2004; Kolko, 2002; NCCANI & NAIC, 2004; Wekerle & Wolfe, 2003).

### **Largest study of its kind**

**3.394** A major strength of this study is that it is the largest study of its kind ever to be conducted. The only comparable study, conducted in Canada, included 76 men aged 23-54 years (Wolfe et al. 2006). Our study involved 247 males and females ranging in age from 40-83 years.



### **Extensive reliable and valid interview protocol**

- 3.395** An extensive reliable and valid interview protocol was used, which allowed data on a range of important constructs to be collected. The protocol included multiple indices of institutional and family-based child abuse and neglect, along with multiple indices of adult adjustment including psychological diagnoses, trauma symptoms, life problems, adult attachment style, marital and parenting relationships, quality of life and global functioning.

### **Qualified interviewers**

- 3.396** Data were collected in face-to-face interviews, not by questionnaire, and these interviews were conducted by a team of psychologists all of whom had been trained in using the interview protocol. Interviews were conducted in an ethical and sensitive manner. Furthermore, a subsidiary study of 52 cases confirmed that good inter-rater reliability was achieved for all variables. The interviewer training, the style of the interviews, and the fact that a reliable and valid protocol was used, allows us to place a high level of confidence in the quality of the data collected.

### **Reduction of type 1 error**

- 3.397** In the statistical analyses in Parts 3-5, steps were taken to reduce type 1 error (interpreting non-significant results as significant). In any set of statistical analyses where a p value is set at .05 for each single test, and if 100 tests are conducted, it may be expected that 5 significant results will be obtained by chance, through type 1 error. To avoid such spurious results, for single items or variables, p-values for t-tests, analyses of variance (ANOVAs) and Chi Square tests were set conservatively at  $p < .01$  (not  $p < .05$ ). For continuous variables assessing child abuse multivariate analyses of variance (MANOVAs) were conducted, before proceeding to ANOVAs or t-tests, since this also controls for type 1 error. In MANOVAs an overall test is conducted to check if groups differ significantly on all variables, before checking whether they differ significantly on each individual variable (using ANOVA or t-tests).

### **Recommendations**

- 3.398** Recommendations arising from this research fall into four broad categories: prevention, treatment, training and research.

#### **Prevention**

- 3.399** The first recommendation is that legislation, policies, practices and procedures be regularly reviewed and revised to maximize protection of children and adolescents in institutional care in Ireland from all forms of abuse and neglect. Specifically the *Children First: National Guidelines for the Protection and Welfare of Children* (Department of Health and Children, 1999) require regular review and revision to insure that they are being properly implemented and that children and adolescents in institutional care, and other forms of substitutive care in Ireland are being adequately protected.

#### **Treatment**

- 3.400** The second recommendation is that evidence-based psychological treatment continue to be made available to adult survivors of Irish institutional abuse. Specifically the National Counselling Service for adult survivors of child abuse in Ireland and similar appropriate services in the UK should continue to be accessible to Irish survivors of institutional abuse. Staff in such services should be appropriately qualified and trained to offer services to clients with complex difficulties, such as multiple co-morbid disorders including anxiety disorders, mood disorders, substance use disorders and personality disorders. It is important these services be evidence-based (Carr, 2006).

## Staff training

- 3.401 The third recommendation is that staff at centres which provide psychological treatment for adult survivors of Irish institutional abuse have regular continuing professional education and training to keep them abreast of developments in the field of evidence-based treatment of survivors of childhood trauma.

## Research

- 3.402 The fourth recommendation is that research be conducted to evaluate the effectiveness of psychological treatment for adult survivors of institutional abuse. The report of *Survivors' Experiences of the National Counselling Service for Adults who Experienced Childhood Abuse* (Leigh et al., 2003) was an important first step in evaluating client satisfaction with the National Counselling Service. However, it did not address the critical issue of the effectiveness of the service provided. Such research is urgently required. Research is also required on levels of child abuse among looked after children (including all categories of children in care and children living in a variety of health, educational, correctional and social services institutions).

## References

- Alonso, J., Angermeyer, M., Bernert, S., Bruffaerts, R., Brugha, T.S., Bryson, H., de Girolamo, G., de Graaf, R., Demyttenaere, K., Gasquet, I., Haro, J.M., Katz, S., Kessler, R.C., Kovess, V., Lépine, J.P., Ormel, J., Polidori, G., Vilagut, G. (2004). Prevalence of Mental Disorders in Europe: Results from the European Study of Epidemiology of Mental Disorders (ESEMeD) Project. *Acta Psychiatrica Scandinavica*, 109 (suppl 420), 21-27.
- American Psychiatric Association (2000). *Diagnostic and Statistical Manual of the Mental Disorders (Fourth Edition-Text Revision, DSM –IV-TR)*. Washington, DC: APA.
- Battle, C., Shea, M., Johnson, D. et al., (2004) Childhood maltreatment associated with adult personality disorders: findings from the collaborative longitudinal personality disorders study. *Journal of Personality Disorders*, 18 (2). 193-211.
- Bentler, P.M. (1990). Comparative fit indices in structural models. *Psychological Bulletin*, 107, 238-246.
- Berliner, L. & Elliott, D. (2002). Sexual abuse of children. In J. Myers, L. Berliner, J. Briere, C. Hendrix, C. Jenny & T. Reid (Ed.), *APSAC Handbook on Child Maltreatment* (Second Edition, pp. 55-78). Thousand Oaks, CA: Sage.
- Bernstein, D. & Fink, L. (1998). *Childhood Trauma Questionnaire: A retrospective self-report*. Manual. San Antonio, TX: The Psychological Cooperation.
- Bierer, L. Yehuda, R., Schmeidler, J., Mitropoulou, V. Antonia, S., Silverman, J. & Siever, L. (2003). Abuse and neglect in childhood: relationship to personality disorder diagnoses. *CNS Spectrums*, 8(10), 737-740, 749-754.
- Bollen, K.A. (1989). *Structural Equations with Latent Variables*. New York: Wiley.
- Bottoms, B. L., Shaver, P. R., Goodman, G. S. & Qin, J. (1995). In the name of God: A profile of religion-related child abuse. *Journal of Social Issues*, 51, 85-111.
- Brennan, K., Clark, C., & Shaver, P. (1998). Self-report measure of adult attachment: An integrative overview. In J. Simpson & W. Rholes (Eds.), *Attachment Theory and Close Relationships* (pp. 46-76). New York: Guilford Press.
- Briere, J. (1996). *Trauma Symptom Inventory*. Odessa, FL: Psychological Assessment Resources.

- Brodsky, B. S., Oquendo, M., Ellis, S. P., Haas, G. L., Malone, K. M. & Mann, J. J. (2001). The relationship of childhood abuse to impulsivity and suicidal behaviour in adults, with major depression. *American Journal of Psychiatry*, 2001, 158, 1871-1877.
- Carr, A. & O'Reilly, G. (Eds.) (2004) *Clinical Psychology in Ireland Volume 5: Empirical Studies of Child Sexual Abuse*. Wales: Edwin Mellen Press.
- Carr, A. (2006a). *Handbook of Clinical Child and Adolescent Psychology: A Contextual Approach (Second Edition, Chapters 19, 20, 21)*. London: Routledge.
- Carr, A. (2006b). *The Effects of Psychotherapy: A Review of Research Prepared for the Irish Council for Psychotherapy*. Dublin, Ireland: Irish Council for Psychotherapy.
- Cohen, J. (1960). A coefficient of agreement for nominal scales. *Educational and Psychological Measurement*, 20, 37-46.
- Colman, R. & Widom, C. (2004). Childhood abuse and neglect and adult intimate relationships: A prospective study. *Child Abuse & Neglect*, 28, 1133-1151.
- Cronbach, L. J. (1951). Coefficient alpha and the internal structure of tests. *Psychometrika*, 16, 297-334.
- Curran, P. J., West, S. G., & Finch, J. F. (1996). The robustness of test statistics to nonnormality and specification error in confirmatory factor analysis. *Psychological Methods*, 1, 16-29.
- Davis, J. & Petretic-Jackson, P. (2000). The impact of child sexual abuse on adult interpersonal functioning: A review and synthesis of the empirical literature. *Aggression and Violent Behaviour*, 5, 291-323.
- Department of Health and Children (1999). *Children First: National Guidelines for the Protection and Welfare of Children*. Dublin: Stationary Office.
- DiLillo, D. & Damashek, A. (2003). Parenting characteristics of women reporting a history of childhood sexual abuse. *Child Maltreatment: Journal of the American Professional Society on the Abuse of Children*, 8(4), 319-333.
- Farrell, D. & Taylor, M. (2000). Silenced by God--an examination of unique characteristics within sexual abuse by clergy. *Counselling Psychology Review*, 15, 22-31.
- Fater, K. & Mullaney, J. (2000). The lived experience of adult male survivors who allege childhood sexual abuse by clergy. *Health Nursing*, 21(3), 281-295.
- First, M., Spitzer, R., Gibbon M., & Williams, J. (1997). *Structured Clinical Interview for DSM-IV Personality Disorders, (SCID-II)*. Washington, DC: American Psychiatric Press.
- First, M., Spitzer, R., Gibbon, M., and Williams, J. (1996). *Structured Clinical Interview for DSM-IV Axis I Disorders, Clinician Version (SCID-CV)*. Washington, DC: American Psychiatric Press.
- Gallagher, B. (1999). The abuse of children in public care. *Child Abuse Review*, 8(6), 357-365.
- Gilligan, R. (2000). The developmental implications for children of life in public care - Irish and international perspectives. *Irish Journal of Psychology*, 21, 3-4, 138-15.
- Goode, H., McGee, H., & O'Boyle, C. (2003). *Time to Listen. Confronting Child Sexual Abuse by Catholic Clergy in Ireland*. Dublin, Ireland: Liffey Press.
- Grant, B., Hasin, D., Stinson, F., Dawson, D., Chou, S. & Ruan, W. J. et al. (2004). Prevalence, correlates, and disability of personality disorders in the United States: results from the National Epidemiologic Survey on Alcohol and Related Conditions. *Journal of Clinical Psychiatry*, 65, 948-58.

- Hardt, J. & Rutter, M. (2004). Validity of adult retrospective reports of adverse childhood experiences: review of the evidence. *Journal of Child Psychology and Psychiatry*, 45, 260–273.
- Hoyle, R.H., & Panter, A.T. (1995). Writing about structural equation models. In R.H. Hoyle (Ed.) *Structural equation modelling: Concepts, issues and applications* (pp. 158-198). London: Sage.
- Hu, L., & Bentler, P. M. (1998). Fit indices in covariance structure modelling: sensitivity to underparameterized model misspecification. *Psychological Methods*, 4, 424-453.
- Hu, L., & Bentler, P. M. (1999). Cut-off criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modelling*, 6, 1-55.
- James, D. E., Schumm, W. R., Kennedy, C. E., Grigsby, C. C., Sheckman, K. L., Nichols, C. W. (1985). Characteristics of the Kansas Parental Satisfaction Scale among two samples of married parents. *Psychological Reports*, 57, 163-169.
- Jöreskog, K., & Sörbom, D. (1981). *LISREL V: Analysis of Linear Structural Relationships by the Method of Maximum Likelihood*. Chicago: National Educational Resources.
- Jöreskog, K. G., & Sörbom, D. (1993). *Structural Equation Modelling with the SIMPLIS Command Language*. Chicago: Scientific Software Inc.
- Jöreskog, K. & Sörbom, D. (1999). *PRELIS 2.30*. Chicago: Scientific Software Inc.
- Jöreskog, K. & Sörbom, D. (2002). *LISREL 8.52*. Chicago: Scientific Software Inc.
- Jöreskog, K., & Sörbom, D. (2005a). *LISREL 8.72*. Chicago: Scientific Software Inc.
- Jöreskog, K., & Sörbom, D. (2005b). *PRELIS 2.72*. Chicago: Scientific Software Inc.
- Kendall-Tackett, K. (2002). The health effects of childhood abuse: Four pathways by which abuse can influence health. *Child Abuse & Neglect*, 26, 715-729.
- Kennedy, E. (1970). *Reformatory and Industrial Schools Systems Report*. Dublin: Stationary Office.
- Kessler, R., Berglund, P., Demler, O., Jin, R. & Walters, E. (2005). Lifetime prevalence and age-of-onset distributions of DSM-IV disorders in the National Comorbidity Survey Replication (NCS-R). *Archives of General Psychiatry*, 62(6), 593-602.
- Kessler, R., Chiu, W., Demler, O. & Walters, E.E. (2005). Prevalence, severity, and comorbidity of twelve-month DSM-IV disorders in the National Comorbidity Survey Replication (NCS-R). *Archives of General Psychiatry*, 62(6), 617-627.
- Kolko, D. (2002). Child physical abuse. In J. Myers, L. Berliner, J. Briere, C. Hendrix, C. Jenny & T. Reid (Ed.), *APSAC Handbook on Child Maltreatment* Second Edition, pp. 21-54). Thousand Oaks, CA: Sage.
- Leigh, C., Rundle, K., McGee, H. & Garavan R. (2003). *SENCS: Survivors' Experiences of the National Counselling Service for Adults who Experienced Childhood Abuse*. Dublin: National Counselling Service
- Luborsky, L. (1962). Clinicians' Judgements of Mental Health. *Archives of General Psychiatry*, 7, 407–417.
- Luthar, S. (2003). *Resilience and Vulnerability : Adaptation in the Context of Childhood Adversities*. Cambridge: Cambridge University Press.
- MacMillan, H. L., Fleming, J. E. & Streiner, D. L. et al. (2001). Childhood abuse and lifetime psychopathology in a community sample. *American Journal of Psychiatry*. 2001, 158, 1878-1883.

- McGee, H. Garavan, R., deBarra, M., Byrne, J. & Conroy, R. (2002). *The SAVI Report. Sexual Abuse and Violence in Ireland. A National Study of Irish Experiences, Beliefs and Attitudes Concerning Sexual Violence*. Dublin, Ireland: Liffey Press.
- McLaughlin, B. (1994). Devastated spirituality: The impact of clergy sexual abuse on the survivor's relationship with God and the church. *Sexual Addiction & Compulsivity*, 1(2), 145-158.
- NCCANI & NAIC - National Clearinghouse on Child Abuse and Neglect Information and the National Adoption Information Clearinghouse (2004). Long-Term Consequences of Child Abuse and Neglect. <http://nccanch.acf.hhs.gov>
- Newcomb, M. & Locke, T. (2001). Intergenerational cycle of maltreatment: a popular concept obscured by methodological limitations. *Child Abuse and Neglect*, 25(9)1219-1240.
- O'Hare, A., Whelan, C.T., & Commins, P. (1991). The development of an Irish census-based social class scale. *The Economic and Social Review*, 22, 135-156.
- Perez, C. & Wodom, C. (1994). Childhood victimization and long-term intellectual and academic outcomes. *Child Abuse & Neglect*, 18(8), 617-633.
- Powers, J. L., Mooney, A. & Nunno, M. (1990). Institutional abuse: A review of the literature. *Journal of Child and Youth Care*, 4, 81-95.
- Quinton, D., & Rutter, M. (1988). *Parenting Breakdown: The Making and Breaking of Inter-Generational Links*. Aldershot, England: Avebury.
- Rossetti, S. (1997). The effects of priest-perpetration of child sexual abuse on the trust of Catholics in the priesthood, Church and God. *Journal of Psychology and Christianity*, 16, 3, 197-209.
- Rutter, M. (2002). Maternal deprivation. In M. Bornstein (Ed.) *Handbook of Parenting: Vol. 4: Social Conditions and Applied Parenting* (Second Edition, pp. 181-202). Mahwah, NJ: Lawrence Erlbaum.
- Rutter, M., Kreppner, J. K., O'Connor, T. G. & the ERA Research Team. (2001). Specificity and heterogeneity in children's responses to profound privation. *British Journal of Psychiatry*, 179, 97-103.
- Rutter, M., Quinton, D. & Hill, J. (1990). Adult outcome of institution-reared children: Males and females compared. In L. Robins, & M. Rutter, Michael (Ed). *Straight and Devious Pathways From Childhood to Adulthood* (pp. 135-157). New York,: Cambridge University Press.
- Satorra, A. (1992). Asymptotic robust inferences in the analysis of mean and covariance structures. *Sociological Methodology*, 22, 249-278.
- Satorra, A., & Bentler, P. (2001). A scaled difference chi-square test statistic for moment structure analysis. *Psychometrika*, 66, 507-514.
- Scher, C., Stein, M., Asmundson, G., McCreary, D. & Forde, D. (2001). The Childhood Trauma Questionnaire in a Community Sample: Psychometric properties and normative data. *Journal of Traumatic Stress*, 14 (4), 843- 857.
- Schumm, W.R., Paff-Bergen, L.A., Hatch, R.C., Obiorah, F.C., Copeland, J.M., Meens, L.D., Bugaighis, M.A. (1986) Concurrent and discriminant validity of the Kansas Marital Satisfaction Scale. *Journal of Marriage & the Family*, 48, 381-387.
- Singleton, N., Bumpstead, R., O'Brien, M., Lee, A. & Meltzer, H. (2001). *Psychiatric Morbidity Among Adults Living in Private Households, 2000*. London, UK: Stationary Office.



- Skevington, S. (2005). *World Health Organization Quality of Life 100 UK Version*. Bath, UK: WHO Centre for the Study of Quality of Life, University of Bath.
- Slep, A. & Heyman, R. (2004). Severity of partner and child maltreatment: reliability of scales used in America's largest child and family protection agency. *Journal of Family Violence*, 19 (2), 95 – 106.
- Soloff, P., Lynch, K. & Kelly, T. (2002). Childhood abuse as a risk factor for suicidal behaviour in borderline personality disorder. *Journal of Personality Disorders*, 16 (3), 201-214.
- Steiger, J.H. (1990). Structural model evaluation and modification: An interval approach. *Multivariate Behavioural Research*, 25, 173–180.
- Tanaka, J.S. (1987). "How big is big enough?" Sample size and goodness off fit in structural equation models with latent variables. *Child Development*, 58, 134-146.
- Torgersen, S., Kringlen, E. & Cramer, V. (2001). The prevalence of personality disorders in a community sample. *Archives of General Psychiatry*, 58, 590-596.
- Wekerle, C. & Wolfe, D. (2003). Child maltreatment. In E. Mash & R. Barkley (Eds.), *Child Psychopathology* (Second Edition, pp. 632-684). New York: Guilford.
- White, H. & Widom, C. (2003). Intimate partner violence among abused and neglected children in young adulthood: The mediating effects of early aggression, antisocial personality, hostility, and alcohol problems. *Aggressive Behaviour*, 29, 332-345.
- Wolfe, D. Jaffe, P., Jette, J. & Poisson, S. (2003). The impact of child abuse in community institutions and organizations: Advancing professional and scientific understanding. *Clinical Psychology: Science & Practice*, 10(2), 179-191.
- Wolfe, D., Francis, K., & Straatman, A. (2006). Child abuse in religiously-affiliated institutions: long-term impact on men's mental health. *Child Abuse and Neglect*, 30, 205-212.