

V. Methodology and Procedures

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1. Outline of the Study: Background – Research Question – Design

The study follows a longitudinal design. Protestant adolescents were surveyed three times, at the beginning of their confirmation time, shortly before their confirmation and two years after confirmation. The focus of analysis is on the developments the adolescents made between the beginning of their confirmation time and two years after confirmation.

The research questions of the project are described in detail in the introduction (p. 12 ff.). They refer to how the adolescents view and evaluate their confirmation time and especially the day of confirmation in retrospect, how their religious attitudes and their relationship to the church developed, and the possible role of being a volunteer especially in confirmation work.

The study is not only longitudinal but was designed such that changes can be captured at a group level as well as at an individual level. Compared to most earlier studies on youth and religion, this can be considered a decisive advantage because it allows for complex forms of analysis, again at a group level and at an individual level. Moreover, at least through the lense of the adolescents' responses, it was also possible to include the influence of childhood experience. Other levels included refer to the Churches participating in the study and to the countries (cf. p. 130 ff.).

The sample consists of the adolescents who completed all three questionnaires. A longitudinal interpretation requires a longitudinal sample. The general questionnaire used two years after confirmation was accompanied by another questionnaire to be completed by those adolescents who had been volunteers in Christian youth work.

2. Questionnaires

The study used a quantitative approach with paper and electronic questionnaires. Questionnaires were filled in at three points of time by the adolescents (in some countries, structural information on the parishes was collected beforehand, called t_0). The surveys t_1 (in the beginning of confirmation time) and t_2 (shortly before confirmation) were conducted within confirmation classes and

Figure 42: The longitudinal sample

<i>Person</i>	<i>t₁</i> <i>Autumn 2012</i>	<i>t₂</i> <i>Spring 2013</i>	<i>t₃</i> <i>Summer/Autumn</i> <i>2015</i>
A	1	2	3 3
B		2	3 3
C	1	2	
D	1	2	2

The figure shows the possible combinations of existing questionnaires: Person A and D filled in all questionnaires, person A additionally filled in the additional questionnaire for volunteers. The data of both persons can be used for the sample. Person B and C did not fill in all questionnaires, so their data could not be used for the sample.

had almost a 100 % return rate. Two years after confirmation, those confirmands who agreed on taking part in t_3 at the end of their confirmation time (in Sweden, also all adolescents who took part in t_1) received a link to the online version of the t_3 -questionnaire and/or a paper version of it. The t_3 -questionnaire had two parts, one main part (on 3 pages) with general questions for all adolescents and one additional part (on one page) for those who were volunteering in Christian youth work or confirmation work. The main part included questions about:

- the confirmation day and the confirmation time in retrospect,
- the current attitudes towards Christian faith and the church
- the relationship towards the church (e.g., services).

The additional part was asking about influences on becoming a volunteer, reasons for volunteering and possibilities of taking part in volunteer trainings. Furthermore, the questionnaires contained some open questions. As in t_1 and t_2 , every item had an itemcode. There are two different numbering systems for the items. Each questionnaire has an ascending question-number, mainly for the use of those who complete the questionnaires. As the questionnaires differ slightly in each country, these ascending numbers could not be standardised for all countries. The item-names that are used for the interpretation of the data, consist of two letters and a two-digit number, e.g., CB07. The first letter indicates the questionnaire:

C = confirmands t_1

K = confirmands t_2

Q = confirmands t_3

W = workers t_1

V = workers t_2

The second letter indicates the section within the questionnaire. Sections with the same second letter in t_1 and t_2 correspond with each other, for example, CE01 corresponds with KE01 and QE01.

All questionnaires were printed in the languages of the participating countries. Because all members of the team speak English, this language was chosen for common communication. This allowed for direct exchange within the team but the translations always required an intermediate step from English into the vernacular. Experts in each country translated the questionnaires into their language from the common English versions, also making sure that confirmands could understand the wording. Some items turned out to be not appropriate for specific countries and consequently were left out in some countries; items used only in particular countries are called »country-specific« items. For some areas of special interest, the four Nordic countries as well as Switzerland incorporated additional items for their contexts. Altogether, the questionnaires in the different countries share more than 80% of their items. They are identical concerning the layout and the order of item-sections. An English version of all questionnaires is available on the internet (www.confirmation-research.eu).

Finally, the results from the EmK (German Methodists) as a Church with different structures as described above (p. 204 ff.) raise special questions concerning possible comparisons. For this reason, the Methodist data were not included with the calculation of international means. In the tables and figures they are presented after the double line.

3. Size of the Sample and Country-Specific Shares

Due to the completely voluntary participation, the size of the t_3 -sample (including the adolescents of the German EmK) is smaller than the t_1 - and t_2 -sample: while 27 969 boys and girls were surveyed in t_1 , and 23 974 adolescents in t_2 , 5 423 (without EmK: 5 196) adolescents responded in t_3 . While Poland and Hungary participated in t_1 and t_2 , they did not carry out t_3 . For the special role of the Hungarian dataset see Schweitzer et al. 2015a, 331.

In consequence, the longitudinal sample – including only those who answered all three questionnaires – amounts to 3 260 adolescents (without EmK

Table 58: Participation rates of the countries in t_1 (2012), t_2 (2013) and t_3 (2014)

	Total*	DE (EKD)	AT	CH	DK	FI	NO	SE	DE (EmK)
N t_1	25980	10191	495	7217	2033	2326	2337	1381	761
N t_2	22734	9096	463	6437	1496	2297	2166	779	620
Send out (t_3)	11503	5012	243	4033	1037	592	586	2317**	450
N t_3	5196	2588	130	1229	334	154	191	570	227
N matched (t_2/t_3) (quota)	3520 (68%)	2129 (82%)	93 (72%)	759 (62%)	106 (32%)	118 (77%)	160 (84%)	155 (27%)	196 (86%)
N matched ($t_1/t_2/t_3$) (quota)	3073 (59%)	1937 (75%)	82 (63%)	662 (54%)	83 (25%)	80 (52%)	115 (60%)	114 (20%)	187 (82%)
N matched (ex-)volunteers ($t_1/t_2/t_3$)	510	354	10	91	—***	24	14	17	—***

* = N of Total is not including the N of the German Methodists (DE EmK) because of their special status. ** = In Sweden, the same adolescents were addressed in t_3 as in t_1 and t_2 . In contrast, in the other countries only those adolescents were addressed, who explicitly expressed their will to take part in t_3 . *** = In Denmark and the Methodist Church in Germany, no extra questionnaires for volunteers were collected.

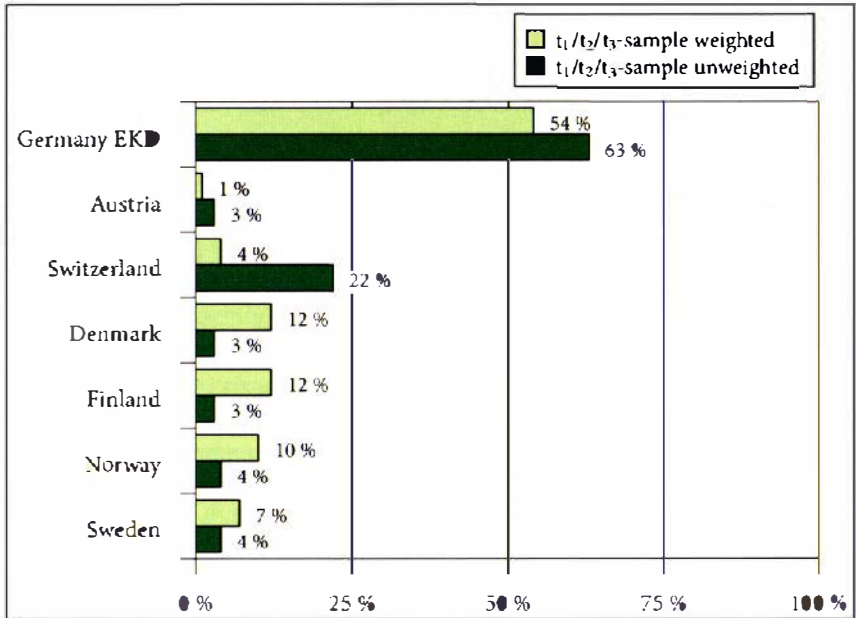
3073), including 510 who are active as volunteers and filled in the additional volunteer's questionnaire (for a detailed overview see p. 25, 108 ff.). More detailed information on the composition of the country-specific samples can be found in the country-reports in this book.

The participation rates are quite different (see Table 58). The share of the questionnaires from Germany and Switzerland are dominating the sample. To reduce this bias, a weighting factor was designed in cooperation with the Leibniz-Institute in Mannheim, Germany (GESIS) (see Figure 43 and Table 59). It is important to note that this weighting factor counterbalances the amount of t_3 -questionnaires according to the number of confirmands in the respective country (population size weights), but it does not generate a representative sample concerning design weights or post-stratification weights.

The quantitative investigation of t_3 builds upon the second study on confirmation work focusing on the two points of investigation at the beginning and shortly before confirmation (t_1/t_2). In t_2 , the adolescents were asked for their willingness to take part in a survey two years after confirmation. If the willingness was given, they were asked for their contact information (email, postal address) to enable contact at a later point of time (2015).

11 503 adolescents or 51 % of the adolescents (without EmK) surveyed in t_2

Figure 43: Country proportions of adolescents before and after using the weighting factor



N = 3073.

were willing to take part in a renewed survey and gave the contact information to the confirmation research project.

In order to ensure the anonymity of the respondents, contact information was surveyed within a separate form.

Two years after their confirmation the adolescents were repeatedly contacted within the t₃-survey. 5196 of them responded (without EmK) answering either online or paper-pencil questionnaires which is 45 % of the 11503 adolescents addressed and 23 % of the 22734 respondents in t₂ (without EmK).

All adolescents participating in t₃ except for those from the EmK and Denmark were presented an additional questionnaire for the case that they were engaging in confirmation work or other voluntary work. This additional questionnaire was answered by 510 respondents, which corresponds to 10 % of all those responding in t₃.

The t₃-dataset used in this study consists of those confirmands who responded both in t₁, t₂, and t₃. The questionnaires from t₁, t₂ and t₃ could be matched by using an individual but anonymous code, the confirmands filled in every time they filled in a questionnaire (third letter of the own first name, third letter of the mother's first name, month of birth, see Schweitzer et al. 2015a, 342). In this way it was possible to match a number of 3073 question-

Table 59: Country-specific shares of the samples

	Germany EKD	Austria	Switzer- land	Denmark	Finland	Norway	Sweden
Proportions of the number of confirmations (2011) N = 438280	54%	1%	4%	12%	12%	10%	7%
Proportions of the t ₁ /t ₂ -sample (weighted; N = 31897)	48%	1%	4%	15%	11%	10%	11%
Proportions of the t ₁ /t ₂ -sample (unweighted; N = 31897)	37%	2%	27%	9%	9%	10%	5%
Proportions of the t ₁ /t ₂ /t ₃ -sam- ple (unweighted; N = 3073)	63%	3%	22%	3%	3%	4%	4%
Proportions of the t ₁ /t ₂ /t ₃ -sam- ple (weighted; N = 3073)	54%	1%	4%	12%	12%	10%	7%
Proportions of the t ₁ /t ₂ /t ₃ -vol- unteer-sample (unweighted; N = 510)	69%	2%	18%		5%	3%	3%
Proportions of the t ₁ /t ₂ /t ₃ -vol- unteer-sample (weighted; N = 510)	60%	1%	4%		22%	7%	7%

naires out of 5196 in total (without EmK). Only those who filled in all three questionnaires are »fully matched« and part of the current sample. In this sample, every questionnaire in t₃ could be connected with the answers of that person in t₁ or t₂.

4. Handling and Presentation of the Data

As described for the different countries above in more detail (see the country-reports), the adolescents were asked to fill in the questionnaires. They were assured that the results would be anonymous. The respective codes of ethics and judicial guidelines were observed.

All paper questionnaires were recorded either manually or by a scanning system into the software SPSS.

Most of the items in the study are listed with their detailed results in the appendix of this book (p. 262ff.). Due to the large number of items, though, only the items with the (usually 7-point) Likert-scales typically used in the study are documented. Additional items that were used only in selected countries are not reported in the appendix.

The results in the appendix display all results for the individual countries as well as for the Total. The Total comprises the data from Germany, Austria, Denmark, Finland, Norway, Sweden, and Switzerland, and is weighted according to the number of confirmands in these countries. In other words, the Total mirrors the weighted average answer of all confirmands in the named countries.

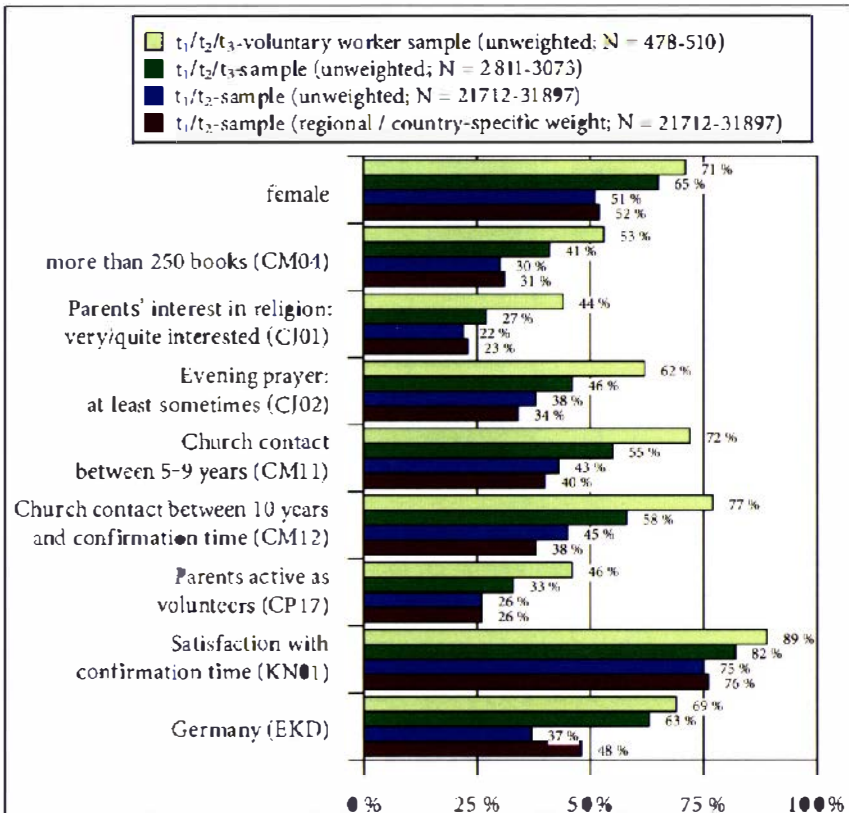
Due to reasons explained above, the data from the EmK was not integrated into the Total. This is the reason, why these results are printed in a separate column in the appendix marked off by the double line.

The tables in the appendix (p. 262ff.) display the results for the »fully-matched«-dataset. This is the reason why the results of t_1 and t_2 differ slightly from the representative results in the appendix of Schweitzer et al. 2015a.

5. Characteristics of the Sample

The sample has a special profile, which can be seen by looking at the so-called background variables. These variables consist of the socio-demographic and biographical data the adolescents stated in their questionnaires, as well as geographical information obtained in the t_0 -survey and make it possible to compare the structure of the sample. The differences between the used $t_1/t_2/t_3$ -sample and the t_1/t_2 -sample (without the results for Poland, Hungary and German EmK) can be summarised as follows: stronger represented than in the t_1/t_2 -sample are the girls, and also adolescents with parental homes showing an affinity to religion and church, education and voluntary work. That means, that adolescents with this profile answered in t_3 more frequently (the profile of the single country-specific samples can be found in the country reports). The cur-

Figure 44: Sociodemographic, biographical and geographical differences between the t_1/t_2 - and the $t_1/t_2/t_3$ -sample



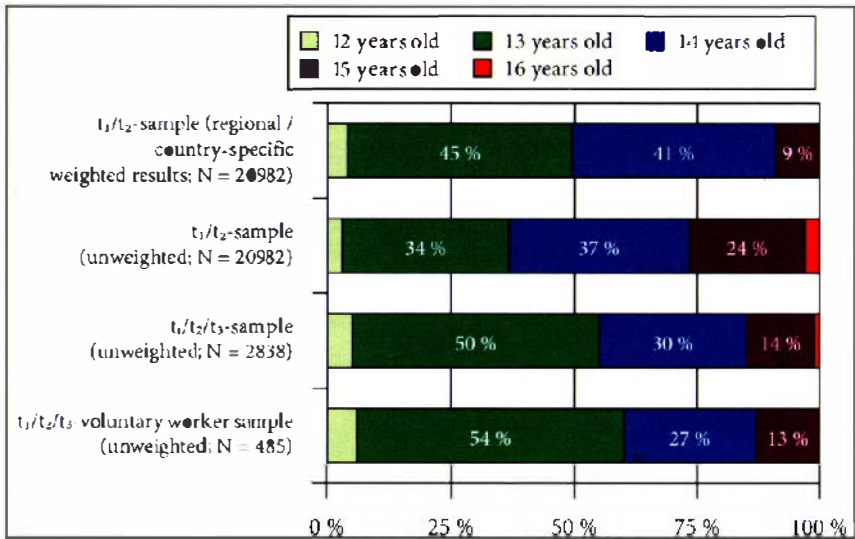
$N(t_1/t_2$ -sample, without Poland) = 18154-31897; $N(t_1/t_2/t_3$ -sample) = 2811-3073; $N(t_1/t_2/t_3$ -sample; volunteers) = 279-353.

rent sample consists of 65% girls and 35% boys (C/K/QM01), in the volunteer-sample, 71% are girls and only 29% are boys. Within the t_1/t_2 -sample, the share was 52% to 48% (in the following, the weighted t_1/t_2 -data is reported).

As Figure 45 shows, most adolescents are between 13 and 14 years old when they are confirmands (86%). Consequently, in t_3 most adolescents are between 15 and 16 years old (80%).

The affinity to education and culture was measured with the question »How many books does your family have at home?« (CM04). 41% have more than 250 books at home. This is considerably higher than in the t_1/t_2 -sample, where 31% stated that they have more than 250 books. Among the volunteers, the share of those with more than 250 books is 53%.

Figure 45: Age of the confirmands / adolescents (in the confirmation period) in specific samples



Remark: The values are calculated without the data of Poland and the German methodist church (DE EmK).

55% of the adolescents in the current sample had contact with the church when they were between five and nine years old (CM11), and 58% from the age to ten up (CM12). 72% resp. 77% of those, who were volunteering two years after confirmation, had contact with the church before their confirmation time. In the t₁/t₂-sample, these values were considerably lower (40% resp. 38%).

The adolescents were asked »How interested are your parents in religion?« (CJ01). 27% of the adolescents describe their parents as very or quite interested, among the volunteers the share is 44% (t₁/t₂-sample: 23%). 46% of the adolescents report, that there was at least sometimes an evening prayer (CJ02), and 62% of the volunteers can tell this. In comparison with the t₁/t₂-sample, the percentage is higher (34%).

33% of the boys and girls state that at least one of their parents is volunteering (CP17: »Are your parents active as volunteers?«), within the group of volunteers this share is 46%. The t₁/t₂-sample consists of 26% of adolescents with voluntary engaged parents.

47% of the adolescents (t₁/t₂: 41%) live in the countryside, 24% (t₁/t₂: 26%) in an urban context. Among the volunteers, the distribution is almost similar (46% resp. 25%). A clear distinction was not possible for the remaining adolescents.

The differences in the composition of the t_1/t_2 -sample and the $t_1/t_2/t_3$ -sample show that the fully matched sample cannot be looked at as representative.

6. Comparisons

The earlier studies on confirmation work were designed as international comparative studies. This was one of the reasons why the samples in the participating countries had to be representative for t_1 and t_2 . The present study follows a different logic. It was designed as a longitudinal study based on the samples from the study carried out in 2012/2013. As described above, this implies that the samples in the countries are not representative because they only comprise those adolescents who were willing to participate. Moreover, the adolescents had to be contacted individually because there is no program in which all of them would take part two years after confirmation. In working with the data one has to keep in mind that international comparisons must not claim representativeness on such a data basis.

The most interesting comparisons in the present study refer to the developments or changes between the beginning of confirmation time, the end of confirmation time and two years after confirmation. In this respect, the data offer a very solid basis because they allow for data analysis and interpretation both at the group level and at the individual level. It is one of the innovative results of the present study that it could be shown that results can be quite different at these levels. Not surprisingly (but often not documented or included in earlier survey studies), not all individuals follow the pattern of the group. This result is also of special interest in respect to education because it can be interpreted as showing, at least among others, the influence of religious education.

The number of volunteers in the study is, of course, much lower than the total number of the adolescents who completed the general questionnaire in t_3 . This is also not surprising because the adolescents who become volunteers, are only one part of the whole group. For interpretation and analysis of the data this has a number of important implications. In some of the countries the number of volunteers in the study is too low for further analysis. Comparisons on a country level are only possible for two of the countries, Germany and Switzerland (for these comparisons see p. 108 ff.).

7. Indexes

Indexes are computed in order to facilitate analyses and comparisons and to improve the validity of interpretations. The present indexes were created by using factor analysis (Varimax with rotation). They are computed as the mean values of all the items enclosed in the index. Only indexes with Cronbach Alpha > 0.7 for the whole dataset and additionally with Cronbach Alpha > 0.6 in each of the participating countries were used. The index-name starts with an »i«, followed by two letters indicating the relevant item-section and a number (e.g., iCB1). The complete list of all indexes is given below. The overall Cronbach Alpha is stated in brackets. Cronbach Alpha for the individual countries is reported in Table 60. The results of the indexes of each country are printed in the appendix (p. 262 ff.).

iQP1: Number of volunteer activities (t_3) (based on QP74-QP81)

- QP74: sports
- QP75: music
- QP76: school (e.g., as a spokesperson for the class)
- QP77: confirmation work
- QP78: Sunday school
- QP79: Christian youth work
- QP80: other youth work
- QP81: another field

iCB1: Faith-related motives (t_1) (0.79)

- CB01: to learn more about God and faith.
- CB03: to come to my own decision about my faith in God.
- CB08: to be strengthened in my faith.

iKB1: Experience of growth in faith (t_1) (0.72)

- KB01: I have learnt more about God and faith.
- KB03: I have been enabled to come to my own decision about my faith.
- KB08: I have been strengthened in my faith.

iCE1: Christian beliefs (t_1) (0.88)

- CE01: God created the world.
- CE02: There is life after death.
- CE03: God loves all humans and cares about each one of us.
- CE04: Jesus has risen from the dead.

- CE08: Faith in God helps me in difficult situations.
- CE09: I believe in God.

iKE1: Christian beliefs (t_2) (0.89)

- KE01: God created the world.
- KE02: There is life after death.
- KE03: God loves all humans and cares about each one of us.
- KE04: Jesus has risen from the dead.
- KE08: Faith in God helps me in difficult situations.
- KE09: I believe in God.

iCL2: Interest in the Christian tradition (t_1) (0.90)

- CL01: Baptism
- CL02: The Lord's Supper
- CL03: Course and meaning of Sunday services
- CL04: Your own parish
- CL05: Jesus Christ
- CL06: The Bible
- CL22: God
- CL24: Resurrection

iKL2: Interest in the Christian tradition (t_2) (0.90)

- KL01: Baptism
- KL02: The Lord's Supper
- KL03: Course and meaning of Sunday services
- KL04: Your own parish
- KL05: Jesus Christ
- KL06: The Bible
- KL22: God
- KL24: Resurrection

iKN3: Satisfaction (t_2) (0.88)

- KN01: the whole confirmation time
- KN03: content/topics of lessons in confirmation work
- KN07: minister/person primarily responsible for confirmation work
- KN08: other teachers/workers
- KNI0: church services
- KNI1: camp(s)
- KNI4: music, songs and singing
- KN20: working methods (for example, working with biblical texts, group work, etc.)

iKS1: Experiences with Church services (t_2) (0.79)

- KS01: I experienced forms of worship adequate for young people (e. g., youth services).
- KS05: I listened to interesting sermons.
- KS12: Singing old church hymns was nice for me.
- KS13: Singing modern church songs was nice for me.
- KS14: The services usually dealt with things that concern me and my life.
- KS16: I liked being part of the worship community.

iKS2: Sense of security and wellbeing in the group during services (t_2) (0.71)

- KS04: I met nice people.
- KS15: I felt secure in the group.
- KS16: I liked being part of the worship community.

iWA1: Importance of Christian tradition (t_1) (0.76)

- WA03: Baptism
- WA04: The Lord's supper
- WA07: Jesus Christ

iWB1: Faith-related aims (t_1) (0.82)

- WB10: get to know other people to whom faith is important.
- WB20: experience the presence of God.
- WC02: be strengthened in their faith.
- WC11: learn to live their everyday life in relationship to God.

iWB2: Aim of focusing services (t_1) (0.81)

- WB30: meet nice people in the services.
- WB31: feel secure and accepted in the group in the services.
- WB32: get orientation for their daily life.
- WB33: experience a friendly atmosphere in the services.
- WB34: get acquainted with the liturgy.
- WB04: experience forms of worship adequate for young people.
- WB28: be given the opportunity to contribute their own ideas to the preparation of a service.
- WB29: have tasks in the services (for example, do a reading).

iWP1: Encouraging voluntary work (t_1) (0.79)

- WP11: get to know young people working in the church as volunteers.
- WP12: get to know parts, programs and tasks in the church where they can work as volunteers.
- WP13: be won for continuing as voluntary workers in the church.

iVB1: Workers' positive experiences with the community in the services (t_2) (0.78)

- VB30: I met nice people.
- VB40: I liked the feeling of being a community.
- VB41: I felt secure in the group.

iVP1

Workers' responsibility for church and society (t_2) (0.76)

- VP37: I want to take part in shaping the church.
- VP39: I want to improve confirmation work.
- VP40: I can change my part of society with my commitment.

iVP2: Workers' feeling of fulfillment in confirmation work (t_2) (0.73)

- VP32: It is fun.
- VP35: I like working with children and adolescents.
- VP45: I like working together with the other workers in the confirmation work team.
- VP46: I like working together with the mainly responsible person for confirmation work (e. g., the minister, deacon, etc.).

iVP3

Workers' perceived impact in confirmation work (t_2) (0.85)

- VP55: I had enough opportunities to realise my own ideas.
- VP56: I had enough opportunities to put my talents and skills to use.
- VP58: I was involved in the conceptualisation of the confirmation training.
- VP61: I have experienced that I can make a difference with my commitment.
- VP62: I carried out meaningful tasks.

Table 60: Cronbach Alpha for all indexes for all countries

Cronbachs Alpha Index	Total	DE	AT	CH	DK	FI	NO	SE	EmK
iCBI: Faith-related motives (t ₁)	0.79	0.79	0.76	0.79	0.65	0.85	0.77	0.78	0.75
iKBI: Experience of growth in faith (t ₂)	0.72	0.77	0.76	0.77	0.78	0.63	0.65	0.61	0.80
iCE1: Christian beliefs (t ₁)	0.88	0.85	0.84	0.87	0.81	0.94	0.89	0.87	0.83
iKE1: Christian beliefs (t ₂)	0.89	0.88	0.90	0.90	0.86	0.94	0.87	0.92	0.90
iCL2: Interest in the Christian tradition (t ₁)	0.90	0.86	0.86	x	0.88	0.94	0.90	0.92	0.85
iK12: Interest in the Christian tradition (t ₂)	0.90	0.88	0.84	0.89	0.89	0.92	0.89	0.92	0.87
iKN3: Satisfaction	0.88	0.87	0.89	0.87	0.75	0.90	0.89	0.83	0.89
iKS1: Experiences with church services	0.79	0.77	0.67	0.80	0.80	0.85	0.78	0.78	0.79
iKS2: Sense of security and well-being in the group during services	0.71	0.71	0.68	0.70	0.63	0.71	0.72	0.71	0.68
iWA1: Importance of Christian tradition	0.76	0.67	0.64	0.71	0.78	0.81	0.74	0.81	0.65
iWB1: Faith-related aims	0.82	0.77	0.78	0.74	0.78	0.86	0.73	0.86	0.66
iWB2: Aim of focusing services	0.81	0.79	0.82	0.77	0.72	0.86	0.76	0.80	0.74
iWP1: Encouraging voluntary work	0.79	0.74	0.75	x	0.88	0.83	0.75	0.74	0.75
iVB1: Workers' positive experiences with the community in the services	0.78	0.78	0.73	0.85	x	0.77	0.85	0.82	0.83
iVP1: Workers' responsibility for church and society	0.76	0.73	0.64	0.60	x	0.82	0.62	0.81	0.86
iVP2: Workers' feeling of fulfillment in confirmation work	0.73	0.67	0.66	0.69	x	0.82	0.80	0.71	0.86
iVP3: Workers' perceived impact in confirmation work	0.85	0.84	0.82	0.84	x	0.89	0.88	0.84	0.86