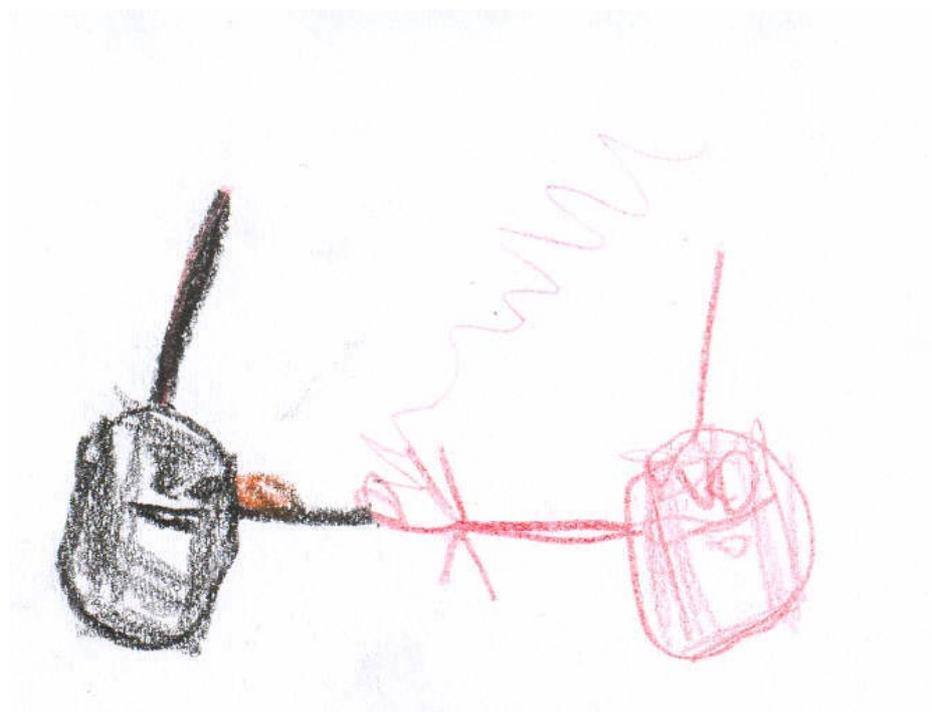


EVALUATION OF THE SMOKING PREVENTION PROGRAM IN KINDERGARTENS



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2 INTRODUCTION

2.1 Smoking statistics

One of the most burning problem of recent times is smoking. According to data for the year 1999 (FACT, 1999) 53.1% of adult men and 30.4% of adult women smoke occasionally or regularly (see Figure 1).

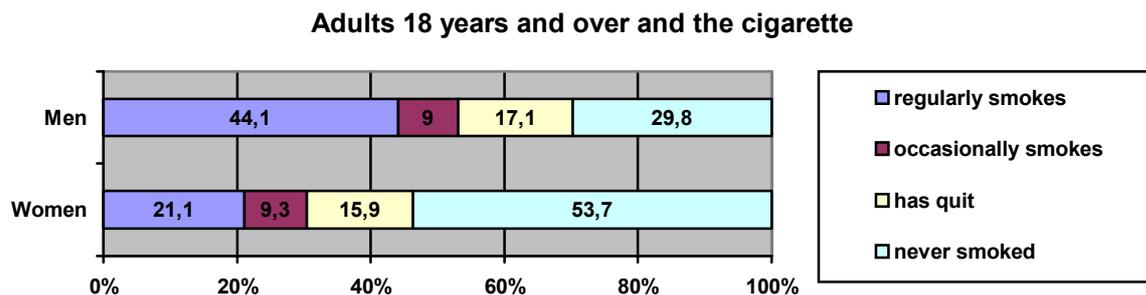


Figure 1: The smoking prevalence of Hungarian women and men

According to the most up-to-date representative data for Hungary (Németh, 2003) of the Global Youth Tobacco Survey coordinated internationally by the World Health Organization (WHO) and the American based Center for Disease Control and Prevention (CDC) 70.7% of young people in grade 7 to 10 (about 13 to 16 years old) have tried smoking and more than one third (33.5%) still smokes with a regularity of at least a month, and 10% of them smoke with daily regularity. Of those who have tried smoking, 17.7% indicated that they first smoke before the age of 10. Between boys and girls (!) and between Budapest and the region of other towns and villages there is no mathematically provable difference. In Hungary the law prohibits the sale of tobacco products to persons under the age of 18. Despite this, more than two third (76.2%) of adolescents indicated that they can buy cigarettes for themselves without any difficulty. Based on 4484 evaluable questionnaires: of 10 students 9 are exposed to tobacco smoke in public places, 8 have someone smoking in their environment at home, and specifically the parents of 6 students smoke. Also 6 students know that passive smoking is harmful, but only 5 have learned to date in school about the harmful effects of smoking.

In Hungary every day 80 people, and every year 28.000 people die from causes that can be related to smoking (KSH (Central Statistical Bureau) 2002). Every day we loose a smoker in every 20 minutes.

The not very promising statistics on smoking urge, beside tobacco control, the widespread introduction of smoking prevention programs aimed at the earliest age possible. This is supported also by the leadership of the WHO; as dr. Lee Jong-wook stated on the 12th World Congress on Smoking (Lee, 2003):

„I think that tobacco control must become part of culture and education as early as in the kindergarten. We have to work with very young children. One of the most efficient way to convince people on something is if we talk to them through their children.”

2.2 Smoking Prevention Program in kindergartens

The basic behavior patterns are imprinted as early as in the day-nursery and in the kindergarten and this is true for smoking too. According to the basic idea of the National Institute for Health Promotion (OEFI) organized smoking prevention activities could and should be conducted from an age when the receptive brain of the child is already exposed to the negative effects that urge them to smoke and when these effects have an influence on his present and future behavior.

Almost 40% of kindergarten children in Budapest are passive smokers (Végh, 2000). In 1992 the objective of the National Institute for Health Promotion (today OEFI) was to create a kindergarten program for smoking prevention that provides information to children in any kindergarten, forms their attitude toward smoking with the primary objective to learn how to avoid passive smoking situations.

To achieve this, a model experiment concept (Demjén, 1994) has been developed and tested in practice (1992 to 1994) in Budapest, and in the towns of Hatvan and Kazincbarcika in four kindergartens with the involvement of the parents as well.

The framework of the activities of the Smoking Prevention Program in Kindergartens (hereinafter referred to as the Program) is a fairy tale (see Appendix 1) consisting of four parts and containing in each part the concepts that are important to understand in this topic. This is complemented by a rich set of instruments developed as the result of the model experiment phase, which makes easier for the kindergarten teachers to achieve the objectives and makes the playful learning process colorful for the children.

The Program can be implemented also by means of the thorough study of the Program Manual included in the program package, however, from 1998 the Program was included in the Database of the Program and Curriculum Development Center of the National Public Education Institute. The teachers who want to implement the Program can get acquainted in detail with the objectives of the Programs with the help of a 30-item training course by using the instruments included in the program package. In addition a nationwide conference, aimed to exchange professional experience, is organized in every two year for the kindergarten teachers participating in the Program. In average two hundred teachers attend this conference.

The creators of the Program consider that a nationwide coverage would be ideal, since they set as the long term objective to form successfully the attitude of a whole generation in the whole country. At the same time the authentic propagation of such a social intervention requires the results of impact studies. The monitoring of the Program has been in progress for several years. The on-going feedbacks from kindergarten teachers showed that it is worth to deal with the topic of smoking even in the 5 to 7 years age group. However the studies conducted so far have failed to address the direct target group of the Program, the children.

2.3 Program evaluation

The purpose of this study is to present a more comprehensive evaluation of the Smoking Prevention Program in Kindergartens carried out in 2002-2003 in a more comprehensible way as before.

The evaluation process includes the evaluation of the process, the impact and the success rate. This time we concentrated primarily on impact evaluation and secondarily on process evaluation. The *impact study* concerns the children and their parents participating in the Program, and tries to measure whether the objectives of the Programs were achieved as intended originally in the short term. Whilst the *process evaluation* targets the kindergarten teachers who have been carrying out the Program for several years. The measurement of the *success rate* can be made later on through the follow-up of the children in their school years.

The base of comparison for the evaluation of the Program (Cook, Leviton, Shadish, 1985) is the declared objectives of the Program: in general the protection of the health of kindergarten-age children. More specifically: starting from the recognition and acceptance of the cherry symbol symbolizing the Program, through the transmission of information corresponding to the characteristics of the age-group and the development of conscious and active behavior against the compulsion of passive smoking, the final objective is the forming of the correct scale of values, health-behavior and attitudes. At the same time the indirect objective is that the parents may change their smoking behavior in the interest of their child (they do not smoke in his presence even if they do not reduce the daily cigarettes quantity.)

2.4 Piaget clinical method of study

It is not worth the trouble to get a kindergarten-age child to fill out questionnaires (primarily not because he does not know how to write) but because he lives under the spell of the moment, no one can guarantee if he says in

the morning that xy is his friend that one hour later he will not state firmly that z is his friend. The study of a kindergarten-age child entails methodological pitfalls. The slogans of scientific type research such as absence of distortion or reliability (Atkinson and al, 1999) are asserted with difficulty if we study kindergarten children. This, however should not mean that we should refuse to try to understand the thinking of children of this young age. Jean Piaget tried as early as in the forties to study the conception, way of thinking, speculation and explanatory principles of this generation primarily on natural phenomena, physical causality, and moral phenomena (e.g. animism, artificialisms). His interviewing method (Piaget, 1970) which he applied based on his experience gained in Binet's laboratory, tried to combine the advantages of the testing method and the direct observation method without their disadvantages. Piaget, as a clinician, checked his hypotheses by means of reactions induced through conversation, but during his control he also let himself controlled. The great enemies of the clinical method are those who take everything the child says at its face value, but also those who do not believe in any of the results of interviewing (Piaget 1970)

This evergreen qualitative method promises to be even today the most appropriate method when the researcher wishes to explore one slice of the cognitive operation of a 5 to 7-year old child. We did the same, and now let us review in more detail the methods used.

3 METHOD

3.1 PERSONS IN THE STUDY

In the impact study that served as the basis of the evaluation *judgment based* (or expert) *sampling* was used. The kindergartens participating in the study were selected firstly on the basis of whether they took part actively in the Smoking Prevention Program in Kindergartens, that is whether the teacher using the Program (incidentally for the first time) had a group of 5 to 7-year old children, and did plan to implement the Program in this year.

Secondly, whether the kindergarten and the kindergarten group concerned are willing to co-operate in this large-scale project.

Thirdly, the evaluation of the Program could only be made in kindergartens where none of the group has used the Program previously. One objective of the evaluation was to learn how the cognition regarding smoking of the children participating in the study have changed as the result of the Program. Among other things, the interpretation of the cherry symbol serving as the basis of the Program has already been affected if the children have encountered for example the cherry poster on the door of another group or anywhere in the kindergarten, and in connection with this had initiated a conversation on this topic.

The above factors fundamentally influence the obtained results, and these will be taken into account when formulating the conclusions drawn from the results.

In the given cases the distorting factors nevertheless were an advantage from the point of view of organizing the study, in so far as the cooperation of the teacher almost automatically resulted in the cooperation of the parents regardless of their smoking attitude and smoking habits. Owing to this, all parents agreed to the study, moreover they agreed that we make video films on some randomly selected children. Despite this, due to sicknesses and other unforeseen events we were not able to reach everybody in each study occasion (see Table 1).

The families of 3 groups of 2 kindergartens participated in the study (N=39) (the 4 groups are marked bold in Table 2). Both participating kindergartens are from Budapest, from district 6 and 8. Due to the small number of elements, no comparison was made between the kindergartens and the groups, the sample was treated subsequently as one.

3.1.1 CHILDREN

The study was carried out with children of 5 to 7 years old. The average age of children in the sample was at the first interview 6 years (standard deviation 7 months), the youngest was 4 years and 9 months old, the oldest 6 years and 11 months. The sex ratio of the children was 18 boys and 21 girls.

3.1.2 PARENTS

The parents of the children participating in the Program were also questioned. Since the survey was made also with the parents in three occasions, it happened that from one family both parents answered the questions at least once, but it also happened that in all three occasions the same parent was found.

Family	Before the Program (child)	Participation in the Program	After the Program (child)	6-month after the Program (child)	Before the Program (parent)	After the Program (parent)	6-month after the Program (parent)
1.	x	6(6)	x	x	x	x	x
2.	x	4(6)	x	x	x	x	x
3.	x	2(6)	x	x	x	x	x
4.	x	6(6)	x	x	x	x	x
5.	x	1(6)	x	x	x	x	x
6.	x	5(6)	x	x	x	x	x
7.	x	5(6)	x	x	x	x	x
8.	x	6(6)	x	x	x	x	x
9.	x	5(6)	x	x	x	x	x
10.	x	3(6)	x	x	x	x	x
11.	x	3(6)	x	x	-	x	x
12.	x	5(5)	x	x	x	x	x
13.	x	5(5)	x	x	x	x	x
14.	x	1(5)	x	x	x	x	x
15.	x	5(5)	x	x	x	x	x
16.	x	5(5)	x	x	x	x	x
17.	x	5(5)	x	x	x	x	x
18.	x	3(5)	x	x	x	x	x
19.	x	5(5)	x	x	x	x	x
20.	x	5(5)	x	x	x	x	x
21.	-	?	-	x	x	-	x
22.	x	3(5)	x	x	x	x	x
23.	x	4(4)	x	x	x	x	x
24.	x	3(4)	x	x	x	x	x
25.	x	4(4)	x	x	x	x	x
26.	x	4(4)	x	x	x	x	x
27.	x	1(4)	x	x	x	-	x
28.	x	0(4)	x	x	x	-	x
29.	x	4(4)	x	x	x	x	x
30.	x	4(4)	x	x	x	x	-
31.	-	0(4)	-	x	x	-	x
32.	x	0(4)	-	x	x	-	x
33.	x	3(4)	x	x	x	x	x
34.	x	4(4)	x	x	x	x	x
35.	x	1(4)	x	x	x	x	x
36.	x	4(4)	x	x	x	x	x
37.	x	1(4)	x	x	x	x	x
38.	x	1(4)	x	x	x	x	x
39.	x	4(4)	x	x	x	-	x

 Table 1¹: Participation of the children and parents in the Program and in the impact study

¹ x: interview was made

- : no interview was made

For indicating participation in the first phase of the Program: e.g. 5(6) means that out of the sessions carried out in 6 days the child was in the kindergarten in 5 days.

3.1.3 KINDERGARTEN TEACHERS

The study carried out with the kindergarten teachers is part of the process evaluation, and is somewhat unrelated to the study of the families. It is aimed at assessing the summary of the experience gained to date by teachers carrying out the Program in an active manner. From all over the country 101 teachers returned the questionnaire prepared specifically for this purpose. At the same time the sample also includes the questionnaires of teachers participating in the above interview.

3.2 STUDY ARRANGEMENTS

The study was made for the first time directly before the introduction of the Smoking Prevention Program in Kindergartens to find out what the children know originally about smoking, thus it will be discovered on what foundation can the Program build. Then the basic phase of the Program was executed in the kindergartens (divided into 4-6 days), then the further interviews were made directly after this and finally, 6 months after the introduction of the Program. Similarly to the children, the parents were interviewed also three times in total.

A questionnaire was mailed in the summer of 2002 to the teachers who have participated in the Program for many years, and all those teachers were included in the sample who returned it during the educational year of 2002/2003.

3.3 METHODS USED

3.3.1 CHILDREN

For assessing the knowledge and attitude of the children the Piaget clinical method of study was used. The structured outline of the interview used with every children is described below. Nevertheless the full process of the clinical interview, by its nature, was not identical for any person.

Our primary aim was to conduct the interview in an informal atmosphere, therefore, each child took part voluntarily in the interview regardless whether the parents gave their consent (see Appendix 2) to the participation of the child in the study. That is, the child could come out from the group room and enter the study room when he felt like it. It happened that one boy was very anxious, so we interrupted the interview with him, however, during our third interview he was pleased to come to play. In addition, in order to draw a map of the knowledge existing in the children's head, the tools used were selected also with a view to the aspect of playfulness.

The children's answers were written on paper at the site, however, to allow us to work later on with the word-by-word text of the interview, we also made audio recordings on each interview with the children.

Below the concept of the Program's objectives can be read in the form of the text of the interviewer. This differs in some places in the interview made before and after the introduction of the Program (for the full order of the interviews see Appendix 3 to 5). Appendix).

→ We came to this little room to play, to play jig-saw, to draw and to talk a little.

3.3.1.1 Smell-preference test

→ I hid three squirrels in these boxes. They are very similar, only their smell is different a bit. Please smell them one by one, and select the one you would like to play with.



Figure 2: The squirrels with no smell, with tobacco smell and with valerian smell

Of the 3 completely identical squirrels, the one with no smell, that is the one with a plush-toy smell, was left as it was. The squirrel with tobacco smell was produced in such a way that five adults smoke one cigarette each and blew the smoke into the bag where one of the squirrels were kept. In addition, in order to make the smell long-lasting, a piece of cotton with tobacco smell produced with a pump (the demonstration tool of the Program, see Figure 3.) was put into an air-tight box (see Figure 2).

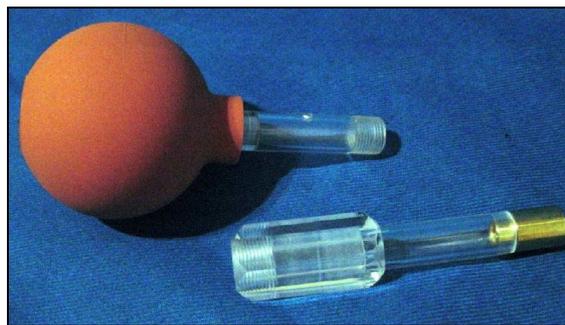


Figure 3: Smoke suction pump

The third squirrel was placed next to a paper tissue saturated with one drop of valerian acid, and after a short time the squirrel had a long lasting valerian smell even without being close to the tissue.

The children smelt one by one the squirrels with no smell, tobacco smell and valerian smell in a random order, then they selected the one which was sympathetic to them. The selected squirrel remained their playmate during the interview, while the other two were taken back to the air-tight box². In none of the cases received the children any feedback on whether they selected well or not.

This task on the one hand served the purpose to be tuned for the interview, and on the other hand to test an assumption that is outside the objectives of the Program, however appears to be interesting, whereas if a child grows up in an environment filled with tobacco smoke, then as the result of being accustomed to tobacco smell he will prefer this smell to the odorless. It also occurred as a question, whether this preference will change as the result of the Program.

² Except for the rare occasion when the child selected the squirrel with valerian smell. It is hard to endure its smell for long period of time, in such a case this squirrel was put back into its box.

3.3.1.2 Interpretation of the cherry symbol

→ I brought you a puzzle, I'm sure you can assemble it! (Cherry symbol)

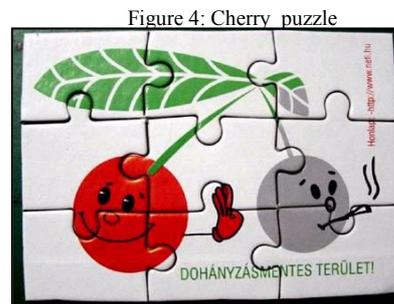


Figure 4: The cherry puzzle

During the assembling of the 9-piece cherry puzzle (see Figure 4) help was only provided when it was requested by the child himself, or when he visibly got stuck so much that it had to be inquired. The jig-saw served the purpose to tune up for the task.

→ Now I show you the same picture in a larger form. Tell me what you see, what is happening on the picture?

Here the child saw a larger cherry sticker, and we tried to encourage him to tell as much as he knows about the picture, to tell everything he notices on the picture. This question was aimed at measuring the level of interpretation of the cherry symbol.

3.3.1.3 Reaction given to the situation of passive smoking

→ Now I show you a picture where you can see a similar squirrel. What is happening on the picture? What are the animals doing? (perhaps: What is in their mouth? - as a helping question). What should the squirrel do in your opinion?

On this picture (see Figure 5) the leading character of the tale belonging to the Program, Squirrel Cleansy can be seen in the company of a smoking goose, pig and rooster. At first the children had difficulty to interpret the picture, therefore, the conversation was guided by helping questions.



Figure 5: Squirrel Cleansy in the company of smoking animals

→ Here is another picture, what are the grown-ups doing, what is in their mouth? What should the little girl do whom you can see on the picture?



Figure 6: Little girl in the company of smoking adults

On Figure 6 a little girl becomes the victim of passive smoking. the question is, what should she do in this situation? The situation is more clear-cut than the previous one, but still we helped the flow of conversation with similar leading questions, since kindergarten-age children have not yet encountered day by day this type of tasks.

→ What do you do when at home someone shows up with a cigarette in the very room where you are playing?

And the third passive smoking situation is the most realistic, what would the child do if he finds himself in such a situation?

3.3.1.4 Assessment of the attitude on smoking, and assessment of knowledge on and relationships of the effects caused by smoking

→ If this squirrel smoked a cigarette, how would he feel? In greater detail?

Here we are talking about the actual playmate of the child. We encouraged the child to give some explanation in addition to saying well or bad, when we asked in greater detail what would happen to the little squirrel if he lit a cigarette.

→ If this feeling had a color, what color it would be?

The replies given to associative questions conceal also a certain knowledge about smoking and the attitude towards it.

→ If it had a smell, what would it be?

→ If it had a taste, what would it be?

→ Please draw a smoking apple.

The interview ends with a task that is liked by the children, however, that is surprising regarding its topic. If the child was uncertain as to how to draw an apple or a cigarette, we helped him only so much (solely in words) that he should draw a ring, and this will certainly look like an apple, and it is enough if he indicates the cigarette with a line.

3.3.1.5 Questions asked only after the introduction of the Program, asking about the fate of the cherry sticker or relating to specific memory traces and studying the relationships existing in the children in connection with the topic of smoking.

→ What did you do with the cherry sticker given to you by the teacher?

A child of 5 to 7-year old will probably be able to tell what he did with the take-home toy since such toys are considered rare in kindergartens, in this case what he did with the cherry sticker and the cherry puzzle. Just for safety's sake we asked the same from the parents as well (see below).

→ Do you still remember the tale titled „The Four Lives of Squirrel Cleansy”? Please tell me because I heard that it is a very interesting tale.

The tale (see Appendix 1) was told without assistance by children who volunteered to do it, and those who could not tell it were urged to tell it by going through the pictures of the tale.

→ What would have happened in the tale to the squirrel, the hedgehog, the rabbit and the magpie if they stayed in the house of the thieves?

The aim of this question was to survey the knowledge on the long term effects of smoking.

→ Do you remember the smoke suction pump?

The following questions are aimed to ask about the experience obtained with the most important demonstration tool of the Program (see Figure 3). It is questionable whether the child understood the essence of the demonstration?

→ What did the teacher do with it?

It is questionable whether he can recall correctly the essence of the process.

→ What happened to the cotton-wool? Why?

The cotton-wool became yellowish brown and smelly, this was the correct answer.

3.3.2 PARENTS

A questionnaire (see Appendix 6 to 8) was filled by the parents. The method of personal interviewing was made in order to obtain more precise information. It happened however that we could not reach in the kindergarten any of the parents of the child (for example because always a brother or sister came to pick up the child, etc.), in such a case we took the risk of more incomplete data and the parents themselves filled out the questionnaire sent to them.

3.3.3 KINDERGARTEN TEACHERS

The teachers received a self-filling questionnaire (see Appendix 9) sent by post and they sent them back the same way.

3.4 HYPOTHESES

The hypotheses of the impact study were adjusted to the following objectives formulated by the Smoking Prevention Program in Kindergartens:

1. To get acquainted and accept the meaning of the cherry symbol.
2. To accommodate information on the level corresponding to age-group characteristics.
3. To develop deliberate and active behavior against the compulsion of passive smoking.
4. To develop the correct scale of values, health behavior and attitudes.

The hypotheses are therefore:

1.
 - a. The level of interpretation of the cherry symbol increases directly after the introduction of the Program as compared to the situation before the introduction of the Program.
 - b. The level of interpretation of the cherry symbol does not diminish compared to this (1.a) even 6 month after the introduction of the Program.
2.
 - a. They can recall correct correlation on smoking and its effect in connection with the recall of the tale and the case of the supposedly smoking squirrel.
 - b. After the introduction of the Program the children will have a greater number of correct sensational associations in connection with smoking.
3.
 - a. In the three different situations of passive smoking but mainly in the most real-life situation, the children give a greater number of relevant, avoiding answers directly after the introduction of the Program.
 - b. In the three different situations of passive smoking but mainly in the most real-life situation the children will give not less (see 3.a) relevant, avoiding answers even 6 months after the introduction of the Program.
4.
 - a. The children become more sensitive to the topic of smoking as the result of the Program.
 - b. This sensitivity will not diminish even 6 months after the introduction of the Program.
 - c. Greater percentage of children reject smoking directly after the introduction of the Program as compared to the situation before the introduction of the Program.
 - d. The rejection of smoking does not diminish even 6 months after the introduction of the Program.

Hypotheses expected beyond the targeted objectives of the Programs and related primarily to the parents.

- I. As the result of the introduction of the Program the smoking habits will change for some parents (do not smoke in the presence of the child, smoke only outside the house, quit smoking, etc.).
- II. The family - identifying itself with the Program's objectives - puts up the cherry sticker in some place in the house.

3.5 METHODOLOGICAL CONSIDERATIONS

- a) The age group studied, namely the 5 to 7-year old kindergarten-age child, itself makes questionable the objectivity and repeatability of the results, since in this age we may get different answers even after half an hour later, owing to the spontaneity of the children.
- b) Our decision for the expert sample, which is inevitable regarding the objectives of the Program, determined that the teacher participating in the study was definitely a beginner in the practice of the Program, and this obviously measures the effect of the work of a particular group of teachers, of course beside measuring the effect of the Program. From this, obviously, we cannot draw general conclusions for all kindergarten teachers. At the same time, this positive effect of the Program, measurable in the study, may even increase if we assume that any experience gained from the Program will increase its effect.
- c) In the technical publication of the Program intended for kindergarten teachers (Program Manual) it is left to the teachers to select which activity he will use from the several alternatives. The advantage of this freedom is the possibility to adopt to the needs of the group, its disadvantage is, however, the imperfection of comparison, which we will try to take into account when the result are interpreted.

4 RESULTS

4.1 QUANTITATIVE ANALYSES

4.1.1 CHILDREN

Let us proceed along the outline of the interview.

→ I hid three squirrels in these boxes. They are very similar, only their smell is different a bit. Please smell them one by one, and select the one you would like to play with.

In this small sample on the quantitative level this variable had no result that could be attributed to the effect of the Program; the „person” of the selected squirrels did not change significantly.

On the one hand, the smelling potential of the children was not controlled in any way, we could not tell why a child who gave very intelligent answers selected twice the squirrel with the valerian smell. We do not know either, for what reasons some other children selected the „critical” squirrel with tobacco smell, apart from the fact that they grow up in an environment smelling of tobacco and this is the natural for them.

It can be said however that at least 71% of the cases the children selected the squirrel with no smell. This happened mostly (87%) 6 months after the introduction of the Program. This was, however, influenced also by the fact that during the interview most of the children were agitated most by the possibility of selecting the squirrel. Thus, when they went back to heir group they asked each other feverishly: „And which one did you select?” A certain norm has developed, whereby the „one with the good smell” should be selected. Despite of mixing up the boxes, this norm may have influenced the unthinking, real preference.

Nevertheless, the squirrels with smell, as a tool, had a positive effect on the progress of the interview, since the majority of children were pleased to take them out of the box. Not even once they served as a transitory object (Winnicott, 1971), they cuddled it, and during the telling of the tale it was also suitable for the purpose of demonstration for those children who liked to gesticulate with the squirrel itself.

→ I brought you a puzzle, I'm sure you can assemble it! (Cherry symbol)

All of the children were able to assemble this 9-piece puzzle, although there were some who needed a little help. The objective, however, was the success, to assemble the puzzle. This exercise, beyond the fact that it is among the favorite activities of the children, also served the purpose of tuning up for the next exercise.

→ Have you seen this picture somewhere? If yes, where?

The question is only interesting prior to the introduction of the Program. The result is, on the one hand, surprising, since „only” 60% of the children have not yet met, by their own account, with the cherry sticker, the reply of part of the others is probably confabulation: „was given by clowns”, „saw it on a street sign boards”, „saw it in the kindergarten”, since the kindergartens were purposefully selected so that the children could not meet with the symbol there, but it is realistic that they received such stickers at sporting events.

Some of the children, just like a certain percentage of adults as well, prefer to reply yes to a question in accordance with the need to conform.

→ Now I show you the same picture in a larger form. Tell me what you see, what is happening on the picture?

The interpretation of the cherry symbol is one of the most important point of the Program. Table 2 shows the scores that can be obtained, that is the levels of content analysis.

0	Gives no answer
99	Gives irrelevant answer (does not talk about the picture)
1	Gives an acceptable list (cherry, sour cherry, apple, tomato)
2	Gives an acceptable list + notices the red-gray difference
3	Gives an acceptable list + notices the red-gray difference on the leaf and/or on the stem as well
4	Detects smoking
5	Detects smoking + emphasizes the differences
6	Detects smoking + expresses that one cherry <i>is sick</i> and/or the other <i>is healthy</i>

Table 2: The content analysis categories of the cherry symbol

Examples:

99: „flower, red, what-do-you-call-it, root” (I 26³ pe⁴)

1 : „a cherry and grapes” (I 4 pe)

2 : „cherry, gray and red cherry, they hang on a bush, on a leaf-bush” (I 19 pe)

3 : „leaf and sour cherry, on has gray leaf, and is gray itself, because one is more ripe than the other” (I 8 pe)

4 : „one cherry that shows that he should not smoke” (I 19 pu⁵)

5 : „one shows that he should not smoke more cigarettes because it will get gray, and this one here does not smoke this why he is so nice red, the cigarette smokes here” (I 12 p6⁶)

6 : „sour cherry, one smoked and became sick, because it is gray, the other did not smoke and is healthy” (I 11 pu)

The interpretation of the cherry symbol allows the testing of several of our hypotheses (1.a., 1.b., 4.a., 4.b).

- a) The symbol of the Program has reached its objective since in both occasions after the introduction of the Program the children interpreted the cherry picture at significantly higher level ($p < 0.1$) using the related sample test (hypotheses 1.a, 1.b).
- b) In the case of 4 or more points given in the interpretation the child detects smoking, a score below this indicates that the child does not actually notices it or does not regard it important to mention smoking⁷. By taking this into account, we can get an answer to the question whether the sensitivity of the children increased due to the effect of the Program. Compared to the interview made before the introduction of the Program significantly ($p < 0.05$) more children detected smoking on the cherry symbol, using the Pearson chi-squared test, during the interview made directly after the introduction of the Program.

(Hypotheses 4.a., 4.b.)

➔ Now I show you a picture where you can see a similar squirrel. What is happening on the picture? What are the animals doing? What should the squirrel do in your opinion?

As compared to the situation before the introduction of the Program, though as a tendency, the number of correct, relevant answers given to this picture (see Figure 5) has increased. For example:

Irrelevant answer: „ the animals smoke cigarettes, the squirrel should look at them” (I 26 pe)

Relevant answer: „they smoke, the squirrel says that his is my house, smokers cannot come in”. (I 26 pu)

³ I 26 =excerpt from the interview of the child code no. 26

⁴ pe = said in the interview made before the introduction of the Program

⁵ pu = said directly after the introduction of the Program

⁶ p6 = said 6 months after the introduction of the Program

⁷ The psychologist making the clinical interview has tried to eliminate this possibility to the best of his ability by avoiding the induced opinion (Piaget, 1970) . He tried to consistently represent the attitude that every small thing the child notices on the picture is important, therefore, he waited patiently while the child ponders over on what he sees on the picture, but did not direct the child’s train of thoughts, only helped him to reveal them (e.g. .. „and why is it like that?”).

→ Here is another picture, what are the grown-ups doing, what is in their mouth? What should the little girl do whom you can see on the picture?

As compared to the situation before the introduction of the Program, though as a tendency, the number of correct, relevant answers given to this picture (see Figure 6) has increased.

Irrelevant answer: „two women and a man are smoking, the girl should play jig-saw.” (I 30 pe)

Relevant answer: „should say to go out to the garden to smoke” (I 30 pu) „the girl should not smoke” (I 30 p6)

→ What do you do when at home someone shows up with a cigarette in the very room where you are playing?

In this real-life situation in both interviews taken after the introduction of the Program the children gave significantly ($p < .017$, and $p < .066$) more correct answers. This may be justified by its real-life nature, since several children said that the animals usually do not smoke, or that different rules apply to them as to children or to people.

Irrelevant answer: „nothing” (I 22 pe)

Relevant answer: „I would tell them that smoking is not allowed because it is harmful to health” (I 22 pu)

(Hypotheses 3.a., 3.b)

→ If this squirrel had smoked a cigarette, how would he feel? In greater detail?

First interview:

This question, or rather the answers given to the question clearly and markedly showed the established attitude of the children even during the first interviews. Namely, at that time there were several children who, apart from this question, usually replied with „I don't know” since the topic of smoking was totally new to them, they never talked about things like this, and they were also taken aback by the new person, the psychologist. However to this question everybody, with the exception of 4 children, answered definitely: according to 80% the squirrel would feel **bad** if he smoked a cigarette. According to 2 children, however, he would feel **good**.

In more detail:

In general: „he should not smoke”, because „he can become an unhealthy, sick person from it” (21%), more precisely: „he would cough, choke” (13%), „his mouth would be smelly from the smoke” (13%), he would feel it in his heart (8%), „he could get cancer”. Or according to 2 children: „smoking cigarettes is a good thing”.

Second interview:

During the second interview only one child failed to give an answer, 1 child stood firm to his answer supporting smoking (good), that is 85% of the children were for „bad”.

In more detail:

Beside the above symptoms mentioned there were: „he would feel it in his lung (becomes black)” (18%), he would have a headache, would feel dizzy” he would seep” „his blood circulation would be bad”, he would feel it in his chest”, he would feel it in his stomach”, he would die”. The proportion of „I don't know” answers has decreased.

Third interview:

Everybody represented an against-smoking attitude, since 38 children „would feel badly in the place of the squirrel who smokes a cigarette”, and one of them literally saw at home that „he would feel similarly nothing” since his father smokes 2 to 3 packets per day and really nothing happens to him, if the child „looks at it thoroughly from the outside”.

However when it is put concretely, it comes to light that according to the child „the cigarette is poisonous, my father could die, 1 to 2 years”.

In more detail:

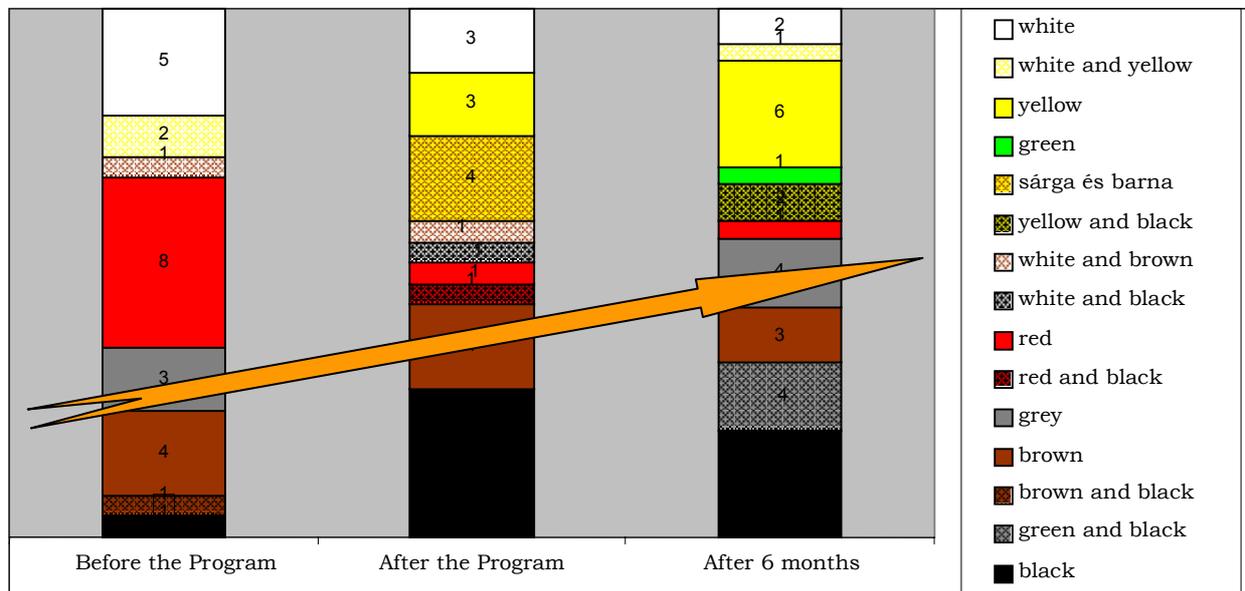
The same symptoms have come up as in the second interview, but they were only more refined such as „he would die *earlier*” he would feel it in all his *body*”. The mentioning of symptoms such as „he would cough, would feel it in his throat” has increased. The proportion of „I don't know” answers decreased further.

In summary it can be said that as compared to the situation before the introduction of the Program the children mentioned significantly ($p < 0.01$) relevant symptoms during both the second and the third interview.

(Hypotheses 4.c., 4.d.)

→ If this feeling had a color, what color it would be?

In the interview taken before the introduction of the Program 20% of the children mentioned the red color, and this greatly decreased in the interviews after the Program, and a considerable percentage of the associations were the dark colors (black, gray, brown and their combinations). The increased mentioning of the yellow color can probably be attributed to the fact that the children observed more thoroughly the color of the cigarette.



→ If it had a smell, what would it be?

While before the introduction of the Program 6 children could not answer this question, after the introduction of the Program only three. Before the introduction of the Program two children regarded the smell of cigarettes as good, after the introduction of the Program none mentioned anything like this. The most frequent answers were „smelly”, „smelling of smoke”, and „bad”.

→ If it had a taste, what would it be?

In this question there was no difference in the different interview dates. The answers mentioned were in the order of frequency: „bad”, „cigarette-taste”, „smoky-taste”, „soot”, „taste of pipe, of cigar”, good”, „no taste”, „bitter”, „sour”, „sweet”. The latter answers, considered as irrelevant represent 1 mentioning each.

(Hypothesis 2.b)

→ Please draw a smoking apple.

The criteria of the drawing analysis were: a child received 1 point each who

- draws a cigarette
- the color of the cigarette is black, brown or blue
- the smoking apple is black, brown or blue
- draws smoke
- a non-smoking apple keeps his hand toward the smoking one to avoid the smoke.

Thus a total of 5 point could be obtained for one drawing.

Accordingly, the following drawings (Figures 7 to 12) serve as examples for the different items:

0 point

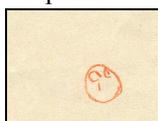


Figure 7: drawing of I 26 pe

1 point

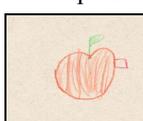


Figure 8: drawing of I 20 pe

2 points



Figure 9: drawing of I 33 pe

3 points

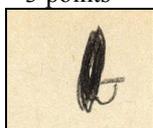


Figure 10: drawing of I 15 pu

4 points

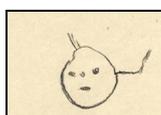


Figure 11: drawing of I 25 pu

5 points

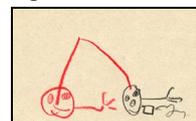


Figure 12: drawing of

0 point	Draws only apple, no cigarette, uses only red color
1 point	Received a point for the cigarette
2 points	Draws cigarette and smoke
3 points	Apple is black, draws cigarette and colors it black
4 points	Apple is black, draws cigarette, colors it black, and also draws smoke.
5 points	The smoking apple is black, has a cigarette in its moth, cigarette is black, it smokes, draws also a healthy, red apple which protests against the smoke.

Table 3: Explanation of the scores of the above drawings

Before the introduction of the Program the average point-score received by the children for their drawings was 1.71 (standard deviation 1.1), Directly after the introduction of the Program the average was 2.23 (standard deviation 1.5) and 6 months after the introduction of the Program the average was 2.7 (standard deviation 1.24).

The drawings made directly after the Program were of significantly higher standard than those made before the Program ($p < .05$). This difference further increased 6 months after the Program ($p < .01$).

After the numbers one cannot resist to add a very fascinating picture. Fascinating, since the little girl (I 4 p6), in contrast with the other children who in average spent 3 to 5 minutes, spent 45 minutes to prepare her work of art (see Figure 13), through a drawing she showed with total empathy and understanding all her knowledge she learned during the Program.

The picture shows apples hanging on a tree branch, some of the apples smoke some do not. The „healthy non-smoking apples are red“, the smoking apples are more and more gray depending on how long have they been smoking. The picture is covered with smoke everywhere.



Figure 13: Smoking apples (I 4 p6)

4.1.1.1 Questions asked only after the introduction of the Program, relating to specific memory traces and studying the relationships existing in the children in connection with the topic of smoking.

→ Do you still remember the tale titled „The Four Lives of Squirrel Cleansy”? Please tell me because I heard that it is a very interesting tale.

The criteria for the content analysis of the tale (see Table 4) was developed later during the listening of the recordings made at the interviews. The development of the criteria and the coding of the tales were carried out by 3 independent observers (who listened to the tales). The following table shows the set of indicators measuring the manifest contents (variables) recalled in connection with the story momentums of the tale (Babbie, 1995). In the indicator column the words in bold had to appear in the tale told by the children for that the given variable could be given a point in the assessment.

MOMENTUMS OF THE TALE	VARIABLES (YES/NO)	INDICATORS
A lightning struck the tree....	There is fire	the tree burns , there is fire
	There is smoke	there is smoke , the ground is covered with ashes
	You can cough from the smoke 1	the squirrel coughs from the smoke
	The smoke causes other symptoms 1	stomach turned/lungs tightened/eyes filled with tears/throat dried out
	The squirrel drinks water	because of the smoke he drinks water
In the house of the Healing Man ...	Sickness	sickness/healing
	Health	they became healthy
	Mine	to find my place, mine
In the house of the thieves ...	Thieves	mentioning of smoking thieves
	Air filled with smoke	air with tobacco smoke/smelly
	Garbage	cigarette butts/ash/garbage everywhere
	Force	the squirrel is forced to smoke
	You can cough from smoke 2	the squirrel coughs from the smoke
	The smoke causes other symptoms 2	stomach turned/lungs tightened/eyes filled with tears/throat dried out
Escape....	Fresh air	they escape to the fresh air

Table 4: Content analysis criteria of the tale „ The Four Lives of Squirrel Cleansy”

As compared to the second interview the children remembered significantly more ($p < .01$) tale elements 6 months after the introduction of the Program, and within this they recalled more symptoms spontaneously from those parts of the tale where the animals landed in a smoky environment, this result was also significant ($p < .01$). As far as the content of the is concerned the children in general showed that they were absorbed by the tale.

(Hypothesis 2.a)

→ What would have happened in the tale to the squirrel, the hedgehog, the rabbit and the magpie if they stayed in the house of the thieves?

Almost half of the children made statements regarding the condition of the animals („they get sick”, made specific symptoms „they die”), the other answers are more of action type („they will be smoking magicians”, they will be afraid”, he would have set them on fire too”, „they would be locked in”, „send the evils out”. Between the second and the third interview there was no important difference in the answers.

(Hypothesis 2.a)

→ Do you remember the smoke suction pump?

$\frac{3}{4}$ th of the children remembered the smoke suction pump even 6 months after the introduction of the Program. This is considered a good ratio because not all of the children participated in the session where this was used, and the smoke suction pump test was not repeated later in any of the groups.

→ What did the teacher do with it?

They not only remembered, but the same number gave the right answer to this question, which means that in their own language they were able to describe the process made by the teacher with the pump.

For example: Pl.: „Here she put the cigarette in, sucked the smoke out and this white something became very smelly and brown” (I 1 pu)

→ What happened to the cotton-wool? Why?

In both occasions after the introduction of the Program the children remembered well the discoloration of the cotton-wool and that it became smelly and smelled of cigarettes. To this color they gave different answers considered as relevant: „yellow”, „brown”, „gray”, „black”, and their combination, the irrelevant answers of „became red” and „remained white” occurred once each.

Therefore it can be said on the test made with the pump that it left an impression in the children which they could independently recall even 6 months after the completion of the test.

(Hypothesis 2.a)

4.1.2 PARENTS

4.1.2.1 General, demographic data

The three interviews provided an opportunity to talk perhaps even to both parents (30%) and this increased the reality of assessing the smoking habits, and in the 1/3rd of the cases it was possible to assess more completely the attitudes towards smoking in the family. In 51% of the cases only the mother could be reached in the kindergarten, in 10% the father and in 1 case each the aunt or the grandmother living with the child could answer the questions.

The average age of the mothers taking part in the study was 34.5 years (standard deviation 6 years), that of the fathers was 37.6 years (standard deviation 7 years).

The socio-economic status (SES) of the parents was determined by following the method of a current representative survey (Aszmann, 2003) which is based on the school qualification and occupation of the parents. The highest (1) category included people in managerial position, with university education and doing white collar jobs, group 2 included people doing white collar jobs, with university and high-school education, group 3 included people with high-school education doing not white collar jobs and the skilled workers, groups 4 and 5 mainly included semi-skilled and unskilled workers with primary school education. The school qualification of those in the „not-classifiable” category is not known. The tables below (Table 5 and 6) show that the socio-economic status of mothers in the samples is considerably lower than that of the fathers, primarily because of the great number of inactive mothers staying at home with small children.

Value	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage (%)
1 (highest)	0	0	0	0
2	10	25,6	27,0	27,0
3	3	7,7	8,1	35,1
4	4	10,3	10,8	45,9
5 (lowest)	3	7,7	8,1	54,1
inactive	17	43,6	45,9	100,0
Total	37	94,9	100,0	
Missing data	2	5,1		
Total	39	100,0		

Table 5: Socio-economic status of the mother/foster-mother

Value	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage (%)
cannot be included	1	2,6	3,3	3,3
1 (highest)	1	2,6	3,3	6,7
2	9	23,1	30,0	36,7
3	11	28,2	36,7	73,3
4	3	7,7	10,0	83,3
5 (lowest)	4	10,3	13,3	96,7
inactive	1	2,6	3,3	100,0
Total	30	76,9	100,0	
Missing data	9	23,1		
Total	39	100,0		

Table 6: Socio-economic status of the father/foster-father

The wealth status of the families (see Table 7) was determined on the basis of the following factors:

- Does the family have a computer?
- How many times did the family had vacation together in the past 12 months?
- Does the family have a passenger car or truck?
- Does the child have his own room?

The categories of our own small size sample were developed by taking into account the categories developed by a representative survey (Aszmann, 2003). It is conspicuous that our sample is disproportionate in such a respect that the top stratum is not represented since the families of districts 6 and 8 of Budapest were studied.

	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage(%)
lower	13	33,3	35,1	35,1
lower-middle	20	51,3	54,1	89,2
upper-middle	4	10,3	10,8	100,0
upper	0	0	0	100,0
Total	37	94,9	100,0	
Missing data	2	5,1		
Total	39	100,0		

Table 7: Family wealth status scale

3/4th of the children in the sample live in whole family ⁸, the rest of the children live in one-parent family.

4.1.2.2 About smoking habits

Even if our sample does not cover fully the proportions of the population regarding economic background, in the field of smoking habits the proportions are similar to those found in the families of the representative survey mentioned in the introduction. Of the 39 families questioned by us in 69 % of the families somebody smokes (see Table 8) in the close family (in 80% of the 13-16 age group), and in 66% of these families at least one parent smokes (in 60% of the 13-16 age group).

	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage(%)
nobody	12	30,8	30,8	30,8
1 person	14	35,9	35,9	66,7
2 persons	8	20,5	20,5	87,2
3 persons	4	10,3	10,3	97,4
5 persons	1	2,6	2,6	100,0
Total	39	100,0	100,0	

Table 8: How many persons smoke at present in the close family?

It is shown below that 41% of the mothers and 54% of the fathers smoke with daily frequency (see Table 9).

	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage(%)
mother	4	10,3	14,8	14,8
father	9	23,1	33,3	48,1
mother+father	8	20,5	29,6	77,8
mother+father+brother/sister	3	7,7	11,1	88,9
father+brother/sister+aunt	1	2,6	3,7	92,6
brother/sister	1	2,6	3,7	96,3
mother+grand parents+uncles	1	2,6	3,7	100,0
Total	27	69,2	100,0	
Does not smoke	12	30,8		
Total	39	100,0		

Table 9: Who smokes at present in the close family?

In total how many cigarettes do the family smokes in average one day in the family (see Table 10). It sounds alarming if we add up the number of packets consumed in one day in a family.

Value	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage(%)
0	12	30,7	30,7	30,7
Less than packet	12	30,8	30,8	61,5
1-2 packets	5	12,8	12,8	74,4
2-3 packets	8	20,5	20,5	94,9
4-5 packets	1	2,6	2,6	97,4
5-6 packets	1	2,6	2,6	100,0
Total	39	100,0	100,0	

Table 10: How many packets does the close family smoke daily?

⁸ In this case the term whole family also includes the case when one parent is a foster-parent, and this is not detailed any further.

76% of smokers, by their own admission, smoke also in the house, in two families the person who smokes lights up in any room in the house (see Table 11).

	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage(%)
nowhere	18	46,2	46,2	46,2
only in 1 designated room	4	10,3	10,3	56,4
only in the shared rooms	15	38,5	38,5	94,9
anywhere, also in the children's room	2	5,1	5,1	100,0
Total	39	100,0	100,0	

Table 11: Where do smokers smoke in the house?

55.5% of smokers admitted that they light up in front of their children. According to 36% the child is not disturbed at all by the smoke. Many said that the smoke may disturb their child a little or moderately, and only 3 said that pretty much or very much. Despite of this, the majority takes steps against the smoke, the most frequent action is the opening of windows.

The above variables were used to form the index variable 'exposure to smoking' as shown below (see Table 12).

VARIABLE	VALUES
The fact that someone smokes in the close family (that is who lives together with the child)?	1 = yes 0 = no
How many persons smoke in the close family?	1-5 persons
In total how packets are smoked in the close family?	1 = Less tan 1 packet 2 = 1-2 packets 3 = 2-3 packets 4 = 3-4 packets 5 = 4-5 packets 6 = 5-6 packets
Does someone smoke in the house?	1 = yes 0 = no
Where do you smoke in the house?	1 = only in 1 designated room 2 = in shared rooms 3 = anywhere, also in children's room
Do you light-up at home in the presence of children?	1 = yes 0 = no

Table 12: Formation of the index variable 'exposure to smoking'

The highest point score that can be obtained on the exposure to smoking index variable is 17, which is considered as an extreme case. It means that 5 people smoke in the family, they smoke more than 5 packets per day, they light up anywhere in the house, therefore, also in the presence of children (see Table 13).

Value	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage(%)
0	12	30,8	30,8	30,8
2	1	2,6	2,6	33,3
3	2	5,1	5,1	38,5
4	1	2,6	2,6	41,0
5	1	2,6	2,6	43,6
6	5	12,8	12,8	56,4
7	5	12,8	12,8	69,2
8	3	7,7	7,7	76,9
9	2	5,1	5,1	82,1
10	2	5,1	5,1	87,2
11	3	7,7	7,7	94,9
14	1	2,6	2,6	97,4
15	1	2,6	2,6	100,0
Total	39	100,0	100,0	

Table 13: 'Exposure to smoking'

4.1.2.3 Smoking as a home topic

The topic of smoking has come up in almost 70% of the families also before the introduction of the Program, and as the result of the Program they did not talk more (either directly after or 6 months later) about smoking with the children. However, the conversations were initiated more often by the child in the period of the introduction of the Program than before. And as it can be seen in Table 14, as the result of the introduction of the Program, the topic of the conversations also changed.

What are the effects of smoking?	pe/pu
Why do people smoke?	pe/pu
Is it good to smoke?	pe/pu
How unpleasant the tobacco smoke is? pe/pu	
The child wants his parent to quit smoking	pe/pu
The child himself does not wish to smoke in the future	pu
The child wishes to smoke, the parents talk him out of it.	pe
They smoke less and less at home	pu
They talked about the Smoking Prevention Program in Kindergartens	pu

Table 14: What was the topic of the smoking-related conversations at home?

The topics of conversations related to smoking changed as the result of the Program such that more children urged the parents to quit smoking, and it happened that a parent mentioned that he/she smokes less and less.

4.1.2.4 Smoking Prevention Program in Kindergartens as a home topic

According to the statements made by one of the parent of children taking part in the Program⁹ in 62% of the families were the Program discussed with the children at home. It is a logical conclusion that those who did not talk about it - with the exception of 1 case - did not notice any difference in the behavior of their child. However, where the topic has come up, 74 % (17 cases) reported changes attributable to the Program. According to 25% of this group the child talked a lot about smoking only during the time of the 4 to 6-day long intensive Program and did not talk about it since. According to 75% the child is steadily and more and more against smoking: rebukes smoking parents or acquaintances, or when it is timely he brings up the topic; one parent mentioned that since the introduction of the Program his/her child goes away when the parents smoke; an other parent reported that the child does not touch the cigarette any more, although earlier he did this often.

In most cases the parents reported that by the end of the conversation they were discussing the harmful effects of smoking. Of the elements of the Program they mentioned the cherry symbol and the pictures of the tale as topics that came up in the conversations at home. It is considered an unavoidable artifact, that the impact study of the Program has also come up for discussion in some families.

4.1.2.5 Smoking as attitude

The parents taking part in the sample evaluated their relation to smoking on a scale ranging from 1 (totally reject it) to 5 (totally accept it). The attitude of the parents giving an answer was in average 2 (standard deviation 1.3), that is it tends toward rejection. As far as their reasons are concerned (see Table 15) most of them regard it harmful both for their own health and for the health of their environment (their own children). Thus, irrespective whether a parent smokes or tries to quit but cannot quit (considers it as a „passion”), and for this reason would not like his child to take up smoking.

⁹ Which is not necessarily a reliable data, since we were able to reach a parent with this question who only rarely stays at home and could not know whether the child talked to the other parent about the Program in the kindergarten.

Aspects mentioned	How many persons mentioned it?
Harmful to health	31
Passion	19
Expensive	12
Is disturbed by the smoke	11
It harms his/her child too	6
Tolerance both to smokers and non-smokers	6
The smoke is also harmful for passive smokers	5
Pollutes the environment	3
Reduces stress	2
He grew up in a non-smoking family, he himself never saw such a model, he never smoke himself	1

Table 15: Reasons for parents' attitude towards smoking

A related question is what the parents think about the Program.

4.1.2.6 The Smoking Prevention Program in Kindergartens

The parents were essentially pleased with the cherry symbol, since in average they evaluated 4.58 and 4.11 on the 5-point scale where the 5 meant „very pleased”. Their evaluation was more positive directly after the Program, which may be explained also by the fact that, although only to a minimal extent, but still the enthusiasm has decreased. The difference, however, was negligible in this small sample.

The way of putting the question, that „did they stick up the cherry sticker at home? did not prove to be appropriate¹⁰, since at least 5 parents immediately said yes, while their child thought that the sticker was lost or remembered that they did not receive any sticker.

Apart from this methodological question, in total in 36% of the families we could be sure¹¹ that the sticker has been put up in some place of the house, since in 14 families have said this consistently both the child and the parent. And the parents reported in exactly the same number of cases that the sticker is still in place now (that is at the time of the interview in May). This is considered as relatively a large number if we take into account that many parents expressly forbid the placement of stickers on furniture, and especially on the entrance door.

(Hypothesis II)

85% of the parents are sympathetic to the Program already directly after its introduction, because „they consider it important that the children learn that smoking is essentially bad”, „because of future self-restraint”, you have to fight „for the health of the future generation”, „it is good that the child learns that from this he will not be a tougher guy”. A few contrary opinions on the other hand emphasize the point, that despite of this Program the peers of the child will initiate the children into smoking, or „they consider the initiative as too early because the children do not comprehend it”.

However the number of parents sympathetic to the Program increased to 92% during the interview made 6 months after the introduction of the Program.

The Program had an effect, although to a small extent, on the smoking habits of parents, whereby 3 parents reported that they smoke less since their child „pushes them”, and even that they do it outside the house. In one case the Program increased motivation for quitting, but it was not successful because since then this father took up smoking again.

(Hypothesis I)

In summary it can be said that the Smoking Prevention Program in Kindergartens (exceeding its objectives) has entered, even if to a small extent, also into the life of the families.

¹⁰ In the future it would be more expedient to ask the question in the following way? „What happened to the cherry sticker?”

¹¹ If we believe in the concordant and independent answer of the child and parent.

4.1.3 KINDERGARTEN TEACHERS

One part of the process evaluation is the follow up of the opinion of kindergarten teachers who have been working for years with the Program.

The distribution of kindergartens in the country is uneven, accordingly the distribution of the 101 questionnaires received from those sent to 327 kindergartens is fluctuating by counties (see Table 16).

County	Frequency (person)	Percentage (%)	Valid percentage (%)	Cumulative percentage (%)
Baranya	3	3,0	3,0	3,0
Bács-Kiskun	28	27,7	27,7	30,7
Békés	5	5,0	5,0	35,6
Borsod-Abaúj-Zemplén	3	3,0	3,0	38,6
Csongrád	1	1,0	1,0	39,6
Fejér	2	2,0	2,0	41,6
Győr-Moson-Sopron	5	5,0	5,0	46,5
Hajdú-Bihar	5	5,0	5,0	51,5
Heves	6	5,9	5,9	57,4
Komárom-Esztergom	8	7,9	7,9	65,3
Nógrád	3	3,0	3,0	68,3
Pest	6	5,9	5,9	74,3
Somogy	1	1,0	1,0	75,2
Szabolcs-Szatmár-Bereg	3	3,0	3,0	78,2
Tolna	2	2,0	2,0	80,2
Vas	1	1,0	1,0	81,2
Veszprém	2	2,0	2,0	83,2
Zala	2	2,0	2,0	85,1
Budapest	15	14,9	14,9	100,0
Total	101	100,0	100,0	

Table 16: In which county are the kindergartens located?

4.1.3.1 How the parents relate to the Program

Uninterested	2%
Missing data	1%
Almost fully supported	27.7%
The majority supported it	69.3%

Figure 13: How the parents' relate to the Program.

Based on the impression of 60% of teachers there was no difference regarding how the smoking and non-smoking parents related to the introduction of the Program. According to the other teachers, the non-smoking parents supported the Program more.

4.1.3.2 Changes in the habits of the parents

62% of the kindergarten teachers have noticed changes in the behavior of the parents, 70% of them indicated that the smoking habits of the parents have become more tolerant. Some quitting also occurred, or one or two parents promised to quit, some did not smoke during her new pregnancy, some felt ashamed or had bad conscience, others have refused the child's request for quitting. The teachers however did not report any protest that would have endangered the operation of the Program¹².

(Hypothesis I)

The majority of the parents gave expression to their pleasure regarding the cherry symbol, because it is „close to the children, clear”, „has an effect also on the parent's smoking habits”, „arouses attention, expressive”, „it is a good symbol of health-illness”, „ingenious”, „he was happy about the happiness of the child”, „they would stick it out also some other place”. A total of 3 teachers reported negative notes from the part of the parents regarding the cherry symbol („smoking-prevention is ineffective in kindergarten-age”, „why cherry?”, „does not arouse attention”).

4.1.3.3 Kindergarten children and smoking

It is a surprising result that of the 98 kindergarten teachers who replied 12 (12%) reported that they know of kindergarten children who have already tried smoking. 9 of them know only 1 child in their kindergarten who smoked, three of them know of more than one child.

Of the children who have tried smoking, a total of 5 tried it with older children by hiding, that is without the knowledge of their parents, 6 children tried it on his own initiative, and after it the parent either scolded him or reacted indifferently. For three children their own parent allowed to smoke a puff. The most shocking was however when a dentist noticed that a kindergarten-age child regularly smokes, it was already noticeable on his teeth.

4.1.3.4 The relation of the children to the Program

According to the teachers the children in general had a more accepting attitude¹³ before the introduction of the Program (average: 2.88) than after the introduction of the Program (average: 1.52). This difference is statistically significant ($p < 0.1$).

According to the teachers the majority understood the meaning of the cherry symbol.

¹² Of course the results may be distorted by the fact that the teachers sending the questionnaires back have probably had some successes during the implementation of the Program, they believe in it, they are committed to it, as opposed to some kindergartens where there were some parents who protested against the Program. Based on the feedbacks of many years we have no knowledge about this, but this does not mean that it does not have to be taken into account.

¹³ Measured on a 5-level scale where 1 = fully reject it, 5 = fully accept it.

But did they like it? The cherry symbol fascinated almost every child. Of the 101 teachers who replied and who during the years dealt with around 100 children only 2 indicated that the child had a problem with the symbol („with an other fruit it would be more interesting”, „not too interesting”).

As interpreted by the teachers, the majority of the children like the cherry symbol because „the cherry is smiling, nice on the picture”, because „he would also like to be healthy”, because „the cherry is a well-know, well-liked fruit”, because „they could take it home and could have an impact on the parents”, because „they were happy to color it to the right color”.

4.1.3.5 Evaluation of the Smoking Prevention Program in Kindergartens according to the kindergarten teachers

The evaluation of the 4 main areas of the Program (see Table 17) showed that the answering teachers consider the areas of the Program relating to sensation and health condition as the most effective.

4.1.3.5.1.1	Area	Frequency (person)	Percent (%)
	Sensation	62	62,6
	Personality	42	42,42
	Health condition	64	64,64
	Smoking	47	47,47
	Missing data	2	2,02

Table 17: In which topics have the children's level of knowledge increased?

The professional statement of the teachers on the different tools of the Program (see Table 18) shows that in total there are 3 tools which very many teachers (30%) considered as could be omitted. Such are the „Smoker's mouth - poster” made for children to deter them, the „Thermo-photo of the hand - poster” made mainly for parents, and the „Women and smoking - booklet”. High percentage of the teachers considered unnecessary the booklet „Do you want to quit?” which was useful according to the creators of the Program. In summary the least number of teachers consider useful the materials intended for parents. With high probability this is also due to the fact that during the Program it is more difficult for some teachers to find the right tone with the parents.

Tools	Useful, necessary (person)	Useful, but needs modification (person)	Could be omitted (person)	Missing data (person)
Program box	84	1	5	11
Program manual	77	5	2	17
Cherry poster	75	2	11	13
Large cherry sticker	82	3	6	10
Small cherry sticker	85	1	3	12
Cherry puzzle	88	3	0	10
Cherry coloring	83	2	1	15
Cherry T-shirt	73	6	9	13
Tale - pictures	82	3	1	15
Tale - series of flat puppets	80	2	2	17
Tale - series of slides	73	2	6	20
Tale - coloring pictures	84	1	1	15
Smoke suction pump	68	6	12	15
Smoker's mouth - poster	39	13	30	19
Recordings of Sound-collecting Peter (cassette)				
Thermal photo of a hand	54	4	27	16
The health damaging effects of smoking - booklet	67	9	5	20
Do you want to quit? - booklet	52	5	19	25
Women and smoking - booklet	37	7	35	22

Table 18: Teachers' assessment on the tools of the Program Box

The more creative teachers gave ideas that have not been included in the program box, but it would be good if it contained: board games, video films, slides, more prohibitory pictures, drawing foldouts, songs in connection with the tale, healthy set of teeth, face, program manual intended for children, T-shirts also for children.

4.2 QUALITATIVE ANALYSES

Quantitative analyses are required primarily to facilitate the apprehension of the results.

Especially the nature of our impact analysis however contains countless qualitative results. In this study 2 case studies are presented, which in addition to their vividness and subjectivity also strengthen the results of the Program.

4.2.1 Case studies

Erika, a little girl who identifies with the Program's objectives, „fights' against smoking

Erika (I 2) (7 years old) grew up in a „never smoking" family, at least her parents did not report that anybody would have quit smoking, and they do not smoke either. Erika has no brother or sister. Before the Program they never talked specifically about smoking with her mother (44 years old) and foster-father (52 years old). It is difficult to believe, however, that the attitude of the parents does not transplant into the child. According to the mother who, by profession is a doctor, „there are few people who from time to time do not smoke a cigarette, this is not a big thing", she thinks „that the important thing is that the person should not get addicted to it". Erika's foster-father (foreman in a book bindery) has a strong anti-smoking opinion: „smoking has many harmful effects. Profit on it is only economical, or for those who have a taste for it. But it has a high price, in addition that it is also harmful to health".

Her experience with the Smoking Prevention Program in Kindergartens was not a topic at home, since Erika talks very little about what happens to her in the kindergarten. Only the foster-father mentioned at home that there is a survey in the kindergarten in connection with the Program, but Erika did not talk about this either. The foster-father feels sympathetic to this Program, he used to get „annoyed when teenage girls puff on cigarettes". According to the mother also „you cannot start smoking prevention early enough".

Erika is a very intelligent, rather introvert girl. The primary reason why her case is important for us is not because her knowledge has considerably widened as the result of the sessions. Since Erika, despite of the fact that according to her parents this topic was hardly discussed at home, even in the first interview interpreted excellently the cherry symbol, put it into words alone? „that smoking is unhealthy” Even at that time she thought that if someone would appear in her door with a cigarette in her mouth, she would say to the person that „no smoking here”. (the majority of her peers in such a situation would continue playing and would not say anything.) She gave accurate sensational associations in connection with smoking: gray, smells like tobacco, bad, tastes like soot.

Directly after the introduction of the Program the most important effect was a **change in attitude** for Erika, namely that the person who smokes must be made to quit. 6 months after the Program this effect increased, since, compared to the previous 1 occasion, in all three passive smoking situations she recommended the idea of quitting as a solution.

- „Look at this picture, here is Squirrel Cleansy, and three other animals. What are these animals doing?
- **They smoke cigarettes. All of them, only Squirrel Cleansy does not.**
- And in your opinion what should Squirrel Cleansy do?
- **She should make them quit smoking.**
- Turn the page please. What do you see here?
- **That they smoke.**
- The girl too?
- **She does not.**
- And in your opinion what should she do, the adults here smoke around her, what should she do?
- **Make them quit smoking.**
- But how should she make them quit smoking?
- **Well, that I don't know, but let's say they like some food, and say if they like chocolate. She says that do not smoke but rather eat something. Something like this.**
- You said something very interesting. Rather eat something instead, chocolate or something like that.
- **And they get into the habit of eating.**
- And it is better if they get into the habit of eating?
- **It is better.**
- What do you do when someone with a cigarette in her mouth comes into the room where you are playing?
- **Let's say in my dolls' house, upstairs?**
- For example.
- **I say that it is not allowed, and say I draw a cigarette which is crossed with red, and stick it onto the door, that it is prohibited. I don't like if people smoke in my room.”**

Erika also told that „at home I assembled the cherry puzzle and took it up in my doll's house and hold such a „fogram” (i.e. a session in connection with the Program) also to my favorite doll. My favorite doll is also called Erika, because she has the same hair too. My doll's house is my private room”. So Erika's role-plays already includes smoking prevention, and even smoking-cessation.

We also present the thorough analysis of the cherry symbol:

- „Can you tell what is on this picture?
- **That a cherry smokes and the other warns it not to smoke.**
- Is there any other small things you would like to tell about the picture?
- **A small thing is, that the one who smokes is gray because it is fully smoky from that cigarette.**
- Where is that smoke?
- **Here inside it, that is why it is so gray. The other cherry however is nice and red. And even the leaf of this is grayish.**
- Now I ask you to draw a smoking apple.
- **Its leaf is totally brown from the lot of cigarettes, it is dried. Its mouth is completely green already. Its nose is completely blue. And the apple is such orange-colored, and brown and such yellow, already here it starts to blacken, and here. And it has mere dry colors like brown, and black and red.**

This is really a very expressive drawing it shows how strong was the Program's impact on Erika, despite of the fact that this topic was not particularly encouraged at home by her parents.



The next case study presents the also particular struggle of a child (I 36) who grew up in a completely different situation.

Laci, who says „all right you smoke in the room and I will close the door”

There is a certain wisdom in this spontaneous statement, which could be stated by Laci after a long-lasting struggle.

Laci's (5;4) parents were in the process of divorce during our first meeting. His mother does not smoke, but the father who still lived with them for a while was a smoker. He does not smoke much, less than one packet per day, but he smokes anywhere in the house, also in the presence of the child. At home smoking has already been a topic of conversation, they talked specifically about smoking because Laci said that he wanted to smoke (just like his father too), and his mother tried to persuade him from doing so. The mother completely rejects smoking, saying that it is „harmful to health”.

At our meeting after the introduction of the Program the mother has reported that during the conversations at home the topic that came up was that why people smoke.

The mother could feel the effect of the Program on Laci: „he is more and more against smoking, and many times tells his father not to smoke”. she was satisfied with the Program, because it supported her attitude too „according to her the children learn from this that they will not be tougher guys if they smoke, therefore the Program does something for the health of the future generation.”

When Laci first met the cherry symbol he already understood its essence, the red cherry (which at that time he called sour cherry) „shows that he must not smoke”. For the gray cherry he said that it is „bad, tastes bad, not real”, he noticed the smaller differences that could be found on the stalks and leaves of the red and the gray cherry.

In the second occasion the interpretation of the cherry picture has changed, it noticeable agitated Laci that he learned something in the kindergarten which is incompatible with the fact that his father smokes.

- „Tell me something about this picture.
- **He cannot stop smoking. And he shows that he does not like smoking.**
- *Is there anything else interesting on this picture?*
- **He is sick because here is gray and here is blue and green.**
- *And from what it has become so gray?*
- **Because he smoked a lot.”**

In the third occasion even the abstract concept of „healthy” appears as a spontaneous manifestation:

- *What is on this picture?*
- **That this one smokes, this is bad, and this one is healthy.**
- *And why is that bad?*
- **Because he smokes cigars or smokes cigarettes.**
- *What else can you tell about this picture?*
- **Cherry, fine.**
- *Is the other also fine?*
- **No.**
- *How come?*
- **It got rotten.**
- *Why did it get rotten?*
- **Because it smokes.**
- *Well, can you tell anything else about this picture?*
- **The leaf of this is black, and green, here is completely green. It is healthy, and this one is bad.**

The answers given by Laci on passive smoking situations have developed also interestingly. He has been the victim of passive smoking from his early childhood, even before he heard that it is a bad thing, he did not think of his own accord that he should do something in such a situation. According to him the girl, around whom many adults smoke, should not do anything else but „to look at this booklet and make the exercise”. Then it is discovered that the child even remembers the situation when his grandfather did the same.

- „Good. What do you do when someone with a cigarette in his mouth comes into your room, where you are playing?
- **Daddy comes in always to smoke.**

- *And what do you do in such a case?*
- **Then I do not say anything to him, let him smoke. But he always smokes. My daddy, he smoked a lot.**
- *Your grandfather?*
- **But he is very old, he has a car, a Zastava.”**

In our second meeting, as the result of the Program, Laci reacted quite differently to the question asked:

- *„Laci, if someone with a cigarette in his mouth comes into the room where you are plying, then what do you do?*
- **I say good, you smoke in the kitchen and I close the door”.**

In the third meeting it is confirmed that at home it is not allowed any more to smoke anywhere but only in the kitchen.

- *„You did not stick this sticker at home?*
- **Yes I did, onto the fridge.**
- *And in your place smoking is not allowed there, in the kitchen?*
- **No, Dad still smokes. Although we told him. Is not allowed in one of the elevators, because it is on the picture.**
- ...
- *Well, you told your father, and he still smokes? And what does he say, why he smokes?*
- **I don't know.**
- *He does not live with you any more, does he?*
- **But we often meet him.**
- *And then he would smoke?*
- **Only a little.”**

But how a difficult conflict it is for Laci that he has knowledge about smoking and at the same time he sees his father smoking regularly, becomes evident from the following dialogue.

- ... *“What should the squirrel do, in your opinion? The others are smoking around him...”*
- **Should say that you should not smoke because the bad air goes into your lung, and he takes the cigarette out from their mouth. You can smoke only one a day, not so many.**
- *How come? You can smoke this way?*
- **You should not smoke.**
- *But you can smoke that just one every day?*
- **Yes. He tells that to them too.**
- *Look at also this picture. What is happening here?*
- **They are smoking.**
- *Are the ladies smoking? And is the little girl smoking?*
- **No.**
- *What should she do, they are smoking around her...*
- **Tell them not to.**
- ...
- *I am curious what you do when someone...*
- **Smokes.**
- *That's right, in the room where you are playing.*
- **Nothing, I take it out from his mouth and through it in the garbage bin, burning. I burn the garbage bin.**
- *Will this be good for you?*
- **No, I put it out before.**

Tension culminates, it is difficult for any child to resolve the issue without a struggle. This issue will be resolved when Laci as a teenager will say to his peers offering cigarettes to him: no thank you. This Program does not set this as a target, because until that time many anti-smoking factors must reach Laci, to prevent him to become addicted to this harmful passion. But the first step was taken by the kindergarten teachers.

5 CONCLUSION

5.1 Summary of the result

5.1.1 Impact study

1. The children got acquainted and accepted the meaning of the cherry symbol. Its standard of interpretation has grown as the result of the Program and based on the answers of the children it did not decrease even 6 months after the introduction of the Program.
 2. The children received information on the level corresponding to their age-group characteristics since after the introduction of the Program they could recall correct connections with smoking and with its effects, through the story of the tale and the tools (smoke suction pump) of the Program. Of the potential symptoms of the presumably smoking squirrel they mentioned several relevant ones after the Program. They gave more and more realistic associations in connection with smoking as the result of the Program.
 3. A deliberate, active behavior against the compulsion of passive smoking has started to develop in the children, in so far as they became more sensitive to the fact of smoking (according to both the clinical study and the reports of their parents) and in the three different situations of passive smoking but mainly in the most real-life situation the children gave a greater number of relevant, avoiding answers directly after the introduction of the Program and this did not decrease even 6 months later.
 4. Correct scale of values, health behavior and attitudes have developed in the children, in so far as they became more sensitive to the topic of smoking, and a greater percentage of them rejected smoking directly after the introduction of the Program as compared to the situation before the introduction of the Program, and this even increased (to 100%) 6 months later.
-
- I. Beyond the targeted objectives of the Program, as the result of the Program the smoking habits of some of the parents (in total 4) have become more tolerant.
 - II. 36% of the families - identifying themselves with the Program's objectives - have put up the cherry sticker in some place in the house.

5.1.2 Process evaluation

Based on the reports of the kindergarten teachers:

- a) Of the 98 kindergartens in 12 there are a child (or more) who have tried smoking. This strengthens the necessity of the Smoking Prevention Program in Kindergartens.
- b) By and large the children enjoy the Program, they like the cherry symbol.
- c) As the result of the Program the children's attitude towards smoking moves to a more negative direction.
- d) Of the different areas of the Program, sensation and health condition are stronger than the personality development or the smoking areas. It is possible that this relates to the fact that 20% of the teachers did not feel the importance of the smoke suction pump (this tool would convey the most amount of smoking-related information), consider that it could be omitted or want to modify it. The use of this tool definitely requires the participation of the teachers in a training course, it is more difficult to learn its proper use from the description in the Program Manual. It is worth considering to start more training courses even for those who are already working with the Program.
- e) In 97% of the kindergartens the majority of the parents support the Program.
- f) 62% of the teachers observed changes in the smoking habits of the parents, by which we mean primarily more tolerant habits and not that they gave up smoking.

5.2 Consideration

The cherry symbol is clearly a captivating and comprehensible symbol of protection against smoking and passive smoking. This picture is more interesting for and attract more the attention of kindergarten-age children and even young school children than the symbol of a cigarette crossed out or broken into two, which is primarily aimed at adults. Thus it is recommended to popularize it in as many ways as possible so it can achieve its objective as widely as possible.

The further intensive employment of teacher training courses is needed so that the teachers can get acquainted more thoroughly with the objectives of the Programs and can get an answer also to the questions of what to do with the brochures intended for the parents.

Here I draw the attention to one piece of the tools used in the Program, namely the smoker's mouth which looks frightening. Frightening is alien from the modern smoking prevention programs, the time of showing cancerous lungs have long expired. The aim of providing information however cannot be harmed just because something is ugly and repulsive. If the child cannot see on the poster how the teeth and the mouth of a smoker will look like after smoking persistently, he will see it live maybe among his relatives, with the difference that he will not necessarily understand for some times this dependence of an effect upon the cause.

As a psychologist I feel that it is more relevant to highlight the fright caused by the Program on a child whose parents smoke, because if in a child the fact of smoking and the possibility of illnesses caused by smoking are associated, then in a short time he gets to the fact that his parents can get ill, and can die. The concept of death in this age is not clarified, and can cause strong anxiety. This topic cannot be avoided if we talk about the problematical points of the Program. The kindergarten teachers must treat with special attention those children who have been more deeply touched by this.

Summa summarum

The evaluation of the Program is not a final summary since the number of children (families) are not great, the studied sample is not representative, despite of this however conclusions can be drawn from the results. Accordingly, the Smoking Prevention Program in Kindergartens certainly fulfills his objectives on a short term (that is within 6 months after its implementation), its longer term effect will have to be measured by the follow up of the children in the school.

Beyond the prevention of smoking, a linguistic question has occurred to me: when will our language reach the point when in the furniture shops the 4-legged storage furniture which stands in the middle of the room and on which we keep the remote control, newspapers or the snacks will not be called **smoke-table** anymore. Our „Smoking culture“ has inhaled nicotine too strongly, it is difficult to get rid of it.

6 LITERATURE

- ASZMANN A. (editet.): *Health behavior of school-aged children. (Iskoláskorú gyermekek egészségmagatartása.)* The report in Hungarian of the international survey by WHO. OGYEI, Bp. 2003 (in print)
- ATKINSON, R.L., ATKINSON, R.C., SMITH, E.E., BEM, D.J., NOLEN-HOEKSEMA, S. (1999) *Pszichológia*, Osiris Kiadó Budapest
- BABBIE, E (1995) *The practice of social science research, (A társadalomtudományi kutatás gyakorlata)*, Balassi Kiadó Budapest
- COOK, T.D., LEVITON, L.C., SHADISH, W.R.JR. (1985) *Program evaluation*, In: Lindzey G., Aronson, E. (Eds.), *Handbook of social psychology*. 3. ed. Random House.
- DEMJÉN T. (1994) *Smoking prevention model experiment in kindergartens (Dohányzás prevenciók modellkísérlet óvodában)*, in: *Egészségnevelés* volume XXXV. March-April
- Effect of smoking on mortality in Hungary (A dohányzás hatása a halandóságra Magyarországon) (1970-1999)*, (2002) Central Statistical Bureau, Budapest
- LEE J. (2003) Opening speach, 12th World Conference on Tobacco or Health, Helsinki
- NÉMETH Á. (2003) *Global Youth Tobacco Survey. Hungary National Report* (in print)
- PIAGET, J. (1970) *Problems and methods (A problémák és a módszerek)*, in: Kiss Á. (edited.) *Selected studies*, Gondolat
- TISTYÁN L., FÜZESI ZS., TÁRNOK M. (1999) *The characteristics of smoking (A dohányzás jellemzői)* in: *Dohányzás és Alkoholfogyasztás*, FACT Institute Pécs
- VÉGH E., KISS É., FERENCZI L., PINTÉR M. (2000) *Passive smoking prevalence of kindergarten children in Budapest (Budapesti óvodások passzív dohányzási prevalenciája)* in: *Egészségnevelés* 2000. issue 4
- WINNICOTT, D.W. (1971) *Playing and Reality*. London Tavistock Publications
- <http://w3.enternet.hu/dohany>

7 APPENDIX

1. Appendix

István Csukás: The Four Lives of Squirrel Cleansy

Once upon a time there was a large forest, on the edge of the large forest there was a big tree, in the big tree there was a hollow and in the hollow lived Squirrel Cleansy. Her fur was shiny and that was no wonder because she used to cleanse it all the time and that is why everybody called her Squirrel Cleansy.

One day Squirrel Cleansy remained alone in the hollow, her brothers, sisters and parents have already set off into the forest to find some hazel-nuts, pine cones and other fine squirrel treats. Squirrel Cleansy shouted to them that I will go soon but first I will cleanse my fur.

As she was cleansing and polishing her fur, all of a sudden a huge storm broke out! The wind roared, the rain poured, the trees swayed and cracked, and the raindrops were pattering on the leaves. It was thundering and huge lightnings flashed out from the clouds.

Cleansy crouched shivering in the depth of the hollow, she did not even dare to poke her nose out, covered her ears and closed her eyes too.

A huge lightning struck the tree! The tree caught fire and burned smouldering.

The smoke poured into the hollow, Cleansy coughed gasping for air.

"This is no joke!" she thought. "In this smoke one can easily choke!"

Her head was dizzy, her stomach turned, her lungs struggled tensely with the smoke, that is to say she really felt horrible. In the great heat her skin started to dry out and so did her throat too.

"Flee Squirrel Cleansy! Flee to the fresh air," she encouraged herself and climbed out of the hollow. The trunk of the tree glowed, it burned her foot while she staggered down the tree. The ground was covered with hot ash, she jumped up and down as she run out of the forest.

When she was out from the burning forest, she sat down at the bank of a little brook to have a rest. In the brook the water gurgled quietly and as she took a big breath, Squirrel Cleansy noticed that she was thirsty. She laid down on the water of the brook and drank the cool, clean water in huge gulps. "This was good," she heaved a sigh of satisfaction. Then she discovered that she was hungry and that was no wonder because in the great fire and in the flight she missed her breakfast. With a searching eye she was looking around in the grass for something to eat. Stepping here and jumping there, she found nothing suitable for a squirrel. "Never

mind," she thought, "if there is no nuts and no cones, I will find something else!" She rummaged on the ground and found a red berry. She smelt it, tasted it by biting a small piece of it and found that it had quite a good taste and swallowed the red berry. She continued her search and found a white root. "Ahem, I will try this one too!" she said, and bit into the white root. The root was bitter and Cleansy spit it out. "This is not good! Bitter."

As she was searching and tasting and sampling, she arrived to the edge of a meadow. A small house stood on the edge of the meadow. Squirrel Cleansy looked at it with curiosity to see who lived in there. "The best will be if I approach it cautiously. Then I will cautiously peek in."

So she did, she approached the little house cautiously and peeped through the door cautiously. She was dumbfounded with astonishment because in the middle of the small house a man with a huge hat was sitting, and around him there was a magpie, a rabbit and a hedgehog! The man with the huge hat started speaking with a smile.

"Come on in, come on in don't be afraid!"

Squirrel Cleansy entered the house then asked with hesitation.

"Who are you?"

"I am the healing man!" was the answer. "And they are my patients and friends: the magpie, the rabbit and the hedgehog."

Squirrel Cleansy just noticed that the magpie's wing was hanging down a bit, the rabbit had a stiff leg and the hedgehog's nose was swollen.

"I see," mumbled Squirrel Cleansy. He is the magpie, he is the rabbit and he is the hedgehog.

Then timidly she asked the man with the huge hat.

"And who am I? Tell me if you are so clever!"

The man with the huge hat kept nodding his hat and smiled.

"I tell you. It is very important for everyone to know about herself who she is! Very important! Because if she knows about herself who she is, then she will find her place in the world. And who finds her place in the world will also find happiness, that is to say will be happy!"

Squirrel Cleansy interrupted him rather impatiently.

"Tell me quickly who I am."

The man with the huge hat puckered up his brow.

"I am telling you, telling you. As I look at you, you are a frightened squirrel kid. As if you have just escaped from some great danger. And as if you sprained your leg a bit. No worries, I will heal it right away. Come closer, don't be afraid!"

Squirrel Cleansy moved closer. The healing man wrapped Cleansy's sprained leg up with a white shawl.

"This is it! This will hold it and keep it warm. And now eat some fine nuts. You like nuts, don't you?"

Squirrel Cleansy nodded her head rapidly indicating that she liked nuts very much! The man with the huge hat gave her nuts in a small basket. Squirrel Cleansy was crunching them happily.

The magpie watched her curiously with his shiny eyes.

"Where did you flee from?"

"From the forest, from the fire!" said Squirrel Cleansy between two crunches.

"Oh!" said the rabbit frightened. "What was the fire like?"

"Hot. And smoky, and sooty," replied Squirrel Cleansy.

"And you were not scared?" asked the hedgehog.

"Oh yes! I was scared a lot," acknowledged Squirrel Cleansy.

"And what did you do?" continued the hedgehog.

"I was scared. I ran and coughed in the meantime." Squirrel Cleansy looked at them smiling. "But now I am not scared. And I don't run. And don't cough. Because I am here among you! And I also know who I am! And I also know that I am not alone. And this is very good!"

They laughed at each other happily like good old friends! The man with the huge hat looked at the small company with satisfaction, he knew it well that laughter and joy is the sure sign of healing! Because he who laughs, thinks less of sickness and he who thinks less of sickness is half-cured already!

He said aloud.

"Now everybody should find the place where he will go to sleep! I go away for awhile."

As the man with the huge hat went away, Squirrel Cleansy looked around in the little house. She saw a flat wicker-basket. She went there and said.

"This will be just right. This will be my sleeping place."

She heard angry squealing behind her back.

"No good! This is not your place. This is my place," said the rabbit squealing. "I was here first and I selected it before you!"

Squirrel Cleansy looked back at him in a friendly way.

"If it is yours than it is yours. I find another place."

She searched and searched and found an old straw-hat.

"This will be just right." she said "This will be my sleeping place."

She heard angry chattering behind her back.

"No good! This is my place!"

The magpie chattered and sat quickly into the straw-hat.

Squirrel Cleansy wagged her head and said.

"If it is you place than it is your place. I find another one."

She searched and searched and found a box full of paper.

"This will be just right!" she said. "It is nice and soft."

She heard angry snorting behind her back.

"No good! This soft is mine!" said the hedgehog snorting and climbed quickly into the box.

"So where can I sleep?" sighed sadly Squirrel Cleansy.

The rabbit looked at her from the wicker-basket, the magpie from the straw-hat and the hedgehog from the box. First the rabbit began to speak.

"Really, where should she sleep? Everybody has a place only she has none!"

"Pull out the cupboard-drawer!" recommended the magpie.

"Come here, I give you half of the paper! Line the drawer with it," said the hedgehog.

Squirrel Cleansy was cheerful again as if the sorrow had been blown away! Why, they like her here! And everybody wants to help!

"Thank you," she whispered. "The drawer will be a very good place! And only mine! It is like a hollow in a tree."

"And you can also pull it or push it over yourself if you want to be alone!" cried out merrily the magpie.

They smiled at each other and slowly went to sleep. It was quiet, only snorting, squealing and chattering could be heard.

They lived on like this in the little house in friendship and affection!

Everybody had his own place, but they also felt that the little house is their common place, that is it belongs to all of them! The healing man watched them with satisfaction as they helped each other in moving and in healing. The rabbit and Squirrel Cleansy used to teach the magpie how to fly. They did it in a way that the rabbit perched himself on the chair and Squirrel Cleansy handed up the magpie to him. The rabbit then put him on the table.

"Go! Fly now!" they urged the magpie.

The magpie flew from the table to the ground wobbling.

"I can fly!" he chattered proudly.

"And my legs are getting stronger in the meantime!" squealed the rabbit.

"And mine are getting stronger too!" boasted Squirrel Cleansy. "As strong as iron!"

"And all of us are breathing in the fresh air!" grinned the hedgehog.

Giggling and laughing, they told what other good things can be done with fresh air. It was as if they had invented a new game.

"Do not breathe in smoke but fresh air!" began the hedgehog all over again.

"Smoke poisons the lung!" said the rabbit.

"He who moves is not sick anymore!" chattered the magpie.

"All the children are healthy!" concluded Squirrel Cleansy.

When they reached the end, they looked at each other in amazement.

"This is like a poem!" stated the rabbit.

"What poem?" asked the magpie.

"The healing poem!" said the hedgehog wisely.

Time has passed, and every morning they recited the healing poem and maybe because of this, all of them were healed completely. The magpie could fly, the rabbit could jump, Squirrel Cleansy could climb the tree and the hedgehog's swollen nose subsided!

One morning however something very wrong happened! The healing man left the house, walked the roads to see where he can find sick animals.

As soon as he left two wicked-faced bearded thieves came by stealthy steps to the little house. They looked through the window and saw that the man with the hat was not at home. With an ugly laughter they sneaked through the door. Squirrel Cleansy could not even recover her wits when they caught her quickly and pushed her into a crate. Just as quickly they caught the magpie, the rabbit and the hedgehog and shoved them into the crate. One of the shaggy man closed the top of the crate and by holding the crate on two sides they bolted.

The thieves' house was in a bushy place, it was a dirty and untidy wooden house. In the wooden house they opened the crate, but first they locked the door, and the animals climbed out. Right away they got a whiff of the foul smell, the stale tobacco smoke, the house was full of cigarette butts, ash, dust and dirt. Since the thieves bad habit was to smoke all the time, they blew smoke like smokestacks, and their teeth were ugly yellow! Even now cigarettes were hanging in their mouths, their clothes and even their skin stank of tobacco smoke.

"Ha ha!" roared the skinnier thief. "Do you want a drag? A puff? Go on!"

And he handed the burning cigarette to them.

Squirrel Cleansy stepped back horrified, the others also turned up their noses.

"Wait with the fag, training will come later!" said the fat thief. "First I tell you why you are here. First of all you are captives, that is prisoners! And you are here because we will make artists of you. Specifically we will make smoking artists of you. Ha ha! This will be a world-wide hit! The cigarette-smoking rabbit! The cigarette-smoking squirrel! The fag-smoking hedgehog! the fag-smoking magpie. Ha ha! A gigantic performance! We start training right away."

He took out a cigarette and lit it.

"Open your mouth!" he said to Squirrel Cleansy.

Squirrel Cleansy shook her head, that she will not open it.

The fat thief viciously grabbed Squirrel Cleansy's head, pressed it behind her ears, so she opened her mouth from the pain. The fat thief quickly pushed the cigarette into her mouth.

"Pull at it!" and pressed her head again.

Squirrel Cleansy was choking from the smoke, coughed, and tears came into her eyes.

The fat thief waved his hand.

"We will continue tomorrow! We have time. Let's go look around in the village what else is there to steal."

And they went out of the house and locked the door.

It was silence, the animals were listening.

"They are gone!" whispered the magpie.

"We should go too!" cried the hedgehog.

"Let's escape!" declared the rabbit.

"We will escape!" stated Squirrel Cleansy.

"But how will we escape? They locked the door!" said the hedgehog sadly.

Squirrel Cleansy went around the room but there was no opening anywhere, there was no hole! She stopped and smiled triumphantly.

"I got it!" she cried out. "We dig a tunnel! There, next to the wall."

They get down to it, they dug, scratched, scooped and shoveled, the tunnel got longer and longer and suddenly they were out from the house!

"We are free!" shouted Squirrel Cleansy. And she drew a colossal breath from the fresh air. The others followed her and ventilated the cigarette smoke from their lungs. When their lungs were full of fresh air, the rabbit started to speak.

"Where should we go?"

"Into the forest!" said Squirrel Cleansy. "Follow me I will show the way!"

They went and went until they reached the edge of the forest. Squirrel Cleansy was happy to see that the forest has turned green again!

"I am here!" she whispered. "I came back! I gained a lot of experience! Although I am still little, but I still had four lives. That's right! First it was the fire. Then I learned who I am. Then I was ill. Then I was suffocating in the smoke. But all's well that ends well!"

The other were listening Squirrel Cleansy with astonishment.

"Well, how clever!" gaped the magpie in astonishment.

"Did I also have four lives?" asked the hedgehog.

"You also had! We were together in the bad! We will be together in the good!" smiled Squirrel Cleansy at him.

And taking a colossal breath from the delicious forest air, they marched chattering, and squealing, snorting and gasping into the green forest.

The End

Appendix 2

DECLARATION 1.

I agree that the employees of the National Health Promotion Center make a videofilm and audio recording of my child; name..... in the kindergarten for the purpose of the impact study of the Smoking Prevention Program in Kindergartens.

I hereby declare that I do not have and will not have in the future any financial claim or claim of any other nature in connection with the film.

Town:, 2002. .

Parent's name (readable): signature:

.....

Parent's name (readable): signature:

.....

In respect of personal rights all data will be used anonymously and only for research purposes. OEFK

Appendix 3

INTERVIEW SHEET 1

	📁 Before the Program
The child's sign	.....
Sex	girl - boy
Remark	.....
Teacher	.....
Kindergarten	..... experimental/control group

➔ We left the others for a while to play, to play jig-saw, to draw and to talk a little. Do you agree?

➔ I hid three squirrels in these boxes. They are very similar, only their smell is different a bit. Please smell them one by one, and select the one you would like to play with.

valerian smell - no smell - tobacco smell - no selection

..... commentary

➔ I brought you a puzzle, I'm sure you can assemble it! (Cherry symbol)

assembles alone - assembles with help - cannot assemble

➔ Now I show you the same picture in a larger form. Tell me what you see, what is happening on the picture?

.....
.....
.....
.....

➔ Now I show you a picture where you can see a similar squirrel. What is happening on the picture? What are the animals doing? (perhaps: What is in their mouth? - as a helping question). What should the squirrel do in your opinion?

says it alone - says it to helping question

.....
.....
.....

➔ Here is another picture, what are the grown-ups doing, what is in their mouth? What should the little girl do whom you can see on the picture?

says it alone - says it to helping questions

.....
.....
.....

➔ What do you do when at home someone shows up with a cigarette in the very room where you are playing?

.....
.....
.....

➔ If this squirrel smoked a cigarette, how would he feel?

.....
.....
.....
.....

➔ If this feeling had a color, what color it would be?

.....

➔ If it had a smell, what would it be?

.....

➔ If it had a taste, what would it be?

.....

➔ Please draw a smoking apple!

4. Appendix

INTERVIEW SHEET 2

	 Directly after the Program
The child's sign	.....
Sex	girl - boy
Remark	.....
Teacher	.....
Kindergarten	..... experimental/control group

➔ Do you still remember me, we met not so long ago. We will play again a little, now with the familiar Squirrel Cleansy. Agreed?

➔ I hid three squirrels in these boxes. They are very similar, only their smell is different a bit. Please smell them one by one, and select the one you would like to play with?

valerian smell - no smell - tobacco smell - no selection

..... commentary

➔ Do you still remember this picture? Tell me what is happening on the picture? (cherry symbol)

.....
.....
.....
.....

➔ Do you still remember the tale „The Four Lives of Squirrel Cleansy”? Tell me please because I heard that it is a very interesting tale.

tells it without helping picture

- **tells it after help**

.....
.....
.....
.....
.....
.....

➔ Now I show you a picture where you can see a similar squirrel. What is happening on the picture? What are the animals doing? (perhaps: What is in their mouth? - as a helping question). What should the squirrel do in your opinion?

.....
.....
.....

➔ Here is another picture, what are the grown-ups doing, what is in their mouth? What should the little girl do whom you can see on the picture?

says it alone - says it to a helping

question

.....
.....
.....

➔ What do you do when at home someone shows up with a cigarette in the very room where you are playing?

.....
.....
.....

➔ What would have happened in the tale to the squirrel, the hedgehog, the rabbit and the magpie if they stayed in the house of the thieves?

.....
.....
.....

➔ Do you remember the smoke suction pump?

remembers from memory – remembers upon presentation – does not remember

➔ What did the teacher do with it?

.....
.....

➔ What happened to the cotton-wool? Why?

.....

➔ If this squirrel had smoked a cigarette, how would he feel? In greater detail?

.....
.....
.....
.....

➔ If this feeling had a color, what color it would be?

.....

➔ If it had a smell, what would it be?

.....

➔ If it had a taste, what would it be?

.....

➔ Please draw a smoking apple!

Appendix 5

INTERVIEW SHEET 3

					 A6 months after the Program
CODE	<input type="text"/>				
Sex		girl	-	boy	
Remark	.....			
Teacher	.....			
Kindergarten	..... experimental/control group				

➔ Do you still remember me, we met not so long ago. We will play again a little, now with the familiar Squirrel Cleansy. Agreed?

➔ I hid three squirrels in these boxes. They are very similar, only their smell is different a bit. Please smell them one by one, and select the one you would like to play with?

valerian smell - no smell - tobacco smell - no selection

..... commentary

➔ Do you still remember this picture? Tell me what is happening on the picture? (cherry symbol)

.....
.....
.....
.....

➔ What did you do with the cherry sticker you received from the teacher?

.....
.....
.....

➔ Do you still remember the tale „The Four Lives of Squirrel Cleansy”? Tell me please because I heard that it is a very interesting tale. These pictures may help.

.....
.....

.....
.....
.....
.....

➔ ➔ Now I show you a picture where you can see a similar squirrel. What is happening on the picture? What are the animals doing? (perhaps: What is in their mouth? - as a helping question). What should the squirrel do in your opinion?

.....
.....
.....

➔ Here is another picture, what are the grown-ups doing, what is in their mouth? What should the little girl do whom you can see on the picture?

question

says it alone - says it to a helping

.....
.....
.....

➔ What do you do when at home someone shows up with a cigarette in the very room where you are playing?

.....
.....
.....

➔ What would have happened in the tale to the squirrel, the hedgehog, the rabbit and the magpie if they stayed in the house of the thieves?

.....
.....
.....

➔ Do you remember the smoke suction pump?

remembers from memory – remembers upon presentation – does not remember

➔ What did the teacher do with it?

.....
.....

➔ What happened to the cotton-wool? **Why?**

.....

➔ If this squirrel had smoked a cigarette, how would he feel? In greater detail?

.....
.....
.....
.....

➔ If this feeling had a color, what color it would be?

.....

➔ If it had a smell, what would it be?

.....

➔ If it had a taste, what would it be?

.....

➔ Please draw a smoking apple!

Appendix 6

QUESTIONNAIRE FOR PARENTS 1.

CODE:

kindergarten sign + sex + age

Before the Program

1. Does anybody smoke at present in the close family (from those who live with the child)?

 nobody person, namely: _____

IF THERE IS SMOKER IN THE FAMILY:

2. About how much does he/she (do they) smoke daily?

*Who?**How much?*_____: - ½ packet ½ - 1 packet 1+ packet (.....)_____: - ½ packet ½ - 1 packet 1+ packet (.....) _____: - ½ packet ½ - 1 packet 1+ packet (.....)3. Is there anybody who has **quit smoking** and does not smoke at present either? About when? No Yes, there is: _____4. **Do you smoke in the house?** No Yes5. If yes, **in which rooms?** Only in one/designated room/own room In the shared rooms (kitchen, sitting room, dining room,) It happens that also in the children's room6. **Do you smoke** at home also in the presence of the child? No Yes → **Do you do anything to reduce smoke** (e.g. open the window, etc.)? :**In your opinion how much does the smoke disturb the child?**1 not at all 2 a little 3 moderately 4 quite 5 much7. **Where** do you smoke **in the presence of the child?** Only in one/designated room/own room In shared rooms (kitchen, living room, dining room,)

It happens that also in the children's room.

!This is asked from everybody!

8. **Have you discussed** the topic of smoking with the child?

No

Yes

What was the topic?

What are the effects of smoking

Why do people smoke (or specifically you)

Is it good to smoke?

Other: _____

9. **Tell** a specific example!

10. **What is your opinion about smoking** in general? (evaluate it from 1 to 5)

*I reject it
fully*

*I accept it
fully*

1

2

3

4

5

Please state the reasons for your opinion! (Why is it, when, how it developed, etc.)

Appendix 7

QUESTIONNAIRE FOR PARENTS 2

CODE:

kindergarten sign + sex + age

After the Program

1. Does anybody smoke at present in the close family (from those who live with the child)? nobody person, namely: _____**IF THERE IS SMOKER IN THE FAMILY:****2. About how much does he/she (do they) smoke daily?***Who?**How much?*_____: - ½ packet ½ - 1 packet 1+ packet (.....)_____: - ½ packet ½ - 1 packet 1+ packet (.....) _____: - ½ packet ½ - 1 packet 1+ packet (.....)**3. Is there anybody who has quit smoking and does not smoke at present? About when?** No Yes, there is: _____**4. Do you smoke in the house?** No Yes**5. If yes, in which rooms?** Only in one/designated room/own room In the shared rooms (kitchen, sitting room, dining room,) It happens that also in the children's room**6. Do you smoke at home also in the presence of the child?** No Yes Do you do anything to reduce smoke (e.g. open the window, etc.)?
_____**In your opinion how much does the smoke disturb the child?**1 not at all 2 a little 3 moderately 4 quite 5 much**7. Where do you smoke in the presence of the child?** Only in one/designated room/own room In shared rooms (kitchen, living room, dining room,)

It happens that also in the children's room.

8. In the past two weeks (during the Program) has the topic of smoking come up at home?

No

Yes

What was the topic? (free recall!)

9. Have you talked with the child specifically about the kindergarten program?

No

Yes

What was the topic? (free recall, after a short break, possible help: list the elements: tale, cherry symbol, smoke suction pump, pictures, audio cassette)

10. Did your opinion changed in connection with smoking in the past two weeks (evaluate it from 1 to 5)?

*did not change
at all*

a little

quite

much

*fully
changed*

1

2

3

4

5

11. Direction of change: my opinion has become more acceptive / rejective.

Please talk a little about this in more detail. (Please give the reasons for your opinion).)

12. Have your own and/or your smoking family members' smoking habits changed?

your own (evaluate from 1 to 5):

<i>did not change at all</i>	<i>a little</i>	<i>quite</i>	<i>much</i>	<i>fully changed</i>
.....
1 <input type="checkbox"/>	2 <input type="checkbox"/>	3 <input type="checkbox"/>	4 <input type="checkbox"/>	5 <input type="checkbox"/>

family members (evaluate from 1 to 5):

<i>did not change at all</i>	<i>a little</i>	<i>quite</i>	<i>much</i>	<i>fully changed</i>
.....
1 <input type="checkbox"/>	2 <input type="checkbox"/>	3 <input type="checkbox"/>	4 <input type="checkbox"/>	5 <input type="checkbox"/>

<i>did not change at all</i>	<i>a little</i>	<i>quite</i>	<i>much</i>	<i>fully changed</i>
.....
1 <input type="checkbox"/>	2 <input type="checkbox"/>	3 <input type="checkbox"/>	4 <input type="checkbox"/>	5 <input type="checkbox"/>

13. How could you characterize this change?

(free recall, after a short brake possible help: opening the window, balcony, smokes less /does not smoke in the presence of the child, smokes less, has quit smoking)

14. What is your opinion about the cherry symbol? (evaluate from 1 to 5)*I don't like it
at all**I like it
very much*1 2 3 4 5 **15. What is your opinion about the Program? (help? how much you like it, do you consider it effective, is it important)**

Appendix 8

Code: **QUESTIONNAIRE FOR PARENTS 3.**

Dear Parent, the participation in the Smoking Prevention Program in Kindergartens, just like the answer to these questions is voluntary. Only researchers can have access to the data, who will handle your answers confidentially, without names. With your answers you will greatly contribute to the survival of the Program.

1. Person giving the answers (please underline the correct answer)

mother - foster-mother - father - foster-father - other:

2. Data relating to the mother/foster-mother

(a) Mother's age: year

(b) Mother's highest school qualification (Please underline the correct answer)

How many primarily school years?

Vocational school

Technical school diploma

High school diploma

College

University

(c) Mother's occupation:

(d) Does the mother has a job at present? (Please check the number of the appropriate answer)

1 Yes

2 Sick, or pensioner, or studies

3 Is in the process of finding work

4 Is at home because she manages the household

5 Is at home because she looks after others (e.g. child care allowance, parent, grandparent)

3. Data relating to the father/foster-father

(a) Father's age: year

(b) Father's highest school qualification (Please underline the appropriate answer)

How many primarily school years?

Vocational school

Technical school diploma

High school diploma

College

University

(c) Father's occupation:

(d) Does the father have a job at present? (Please check the number of the appropriate answer)

- 1 Yes
- 2 Sick, or pensioner, or studies
- 3 Is in the process of finding work
- 4 Is at home, because he manages the household
- 5 Is at home because she looks after others (e.g. child care allowance, parent, grandparent)

4. Other questions

(a) How many computers does the family have?:

(b) How many times did the family have vacation together in the past 12 months?:
.....

(c) Does the family have a passenger car or truck? (Please check the number of the correct answer)

1. No
2. One
3. Two or more

(d) Does the child (who participates in the study) have his own room?:

Thank you that you help our work with your answers!

Appendix 9

QUESTIONNAIRE FOR TEACHERS



FRONT PAGE

(Please attach the personal sheets)

■ Kindergarten's name: _____

■ Kindergarten's address: _____

■ Group type: *(Please check the appropriate box)*

mixed group

group for 5-7 years old

■ Names of teachers leading the group:

■ Have your kindergarten ever participated in the *Smoking Prevention Program in Kindertartens?*

(Please check the appropriate box)

No

Yes --

If yes, in which school year(s)?

1994/95
1995/96
1996/97
1997/98
1998/99
1999/00
2000/01
2001/02

Thank you that by completing this questionnaire you help our work and contribute to the survival of the Program.

PERSONAL SHEET

! PLEASE COMPLETE IT *BEFORE* THE PROGRAM !

FIRST OF ALL A FEW QUESTIONS ABOUT **YOU**:

1. Your name: _____

2. Have **you** participated before in the *Smoking Prevention Program in Kindergartens*?
(Please check the appropriate box)

No

Yes -- *If yes, in which school year(s)?*

1994/95

1995/96

1996/97

1997/98

1998/99

1999/00

2000/01

2001/02

3. *If yes*, did you smoke at the start of the Program? (Please check the appropriate box)

No

Yes -- *If you smoked at the start of the Program, have you quit smoking since?*

no

yes

yes, as the result of the Program

4. Do you know that in connection with the *Smoking Prevention Program in Kindergartens* there is a possibility to take part in a 30-point training course?

No

Yes

5. Would you take part in such a training course for teachers?

No

Yes

Please give the reasons for your opinion. (Why this is, when, how did it formed, etc. ...)

8. If you smoked during the Program, or if you smoke also at present, **did it cause any difficulty or conflict** ? (Please check the appropriate box)

No

Yes

If yes, with whom? -----
 with yourself
 with the children
 with the parents
 with the colleagues
 with other persons:

If yes,
 has this conflict been solved since?

No

Yes

9. Please describe in a few words **the essence of the problem!**

10. **Have you talked** with the children about the topic of smoking (meaning the present group)?

No

Yes

What was the topic?

What are the effects of smoking?

Why do people smoke (or specifically you)?

Is it good to smoke?

Other: _____

9. **Please tell** a specific example

! PLEASE COMPLETE *AFTER* THE PROGRAM!1. Do you smoke at present? (*Please check the appropriate box*)

- No
 Yes --

If yes, about how much do you smoke daily?

- few cigarettes= ½ packet
 ½ = 1 packet
 1 +packet (.....)

Do you smoke in the kindergarten?

- No
 Yes --

If yes, in which rooms?

- Only in a room designated for smoking / in the yard
 In shared rooms (kitchen, passage, etc. ...)
 It happens that also in the group's room

Do you light up in the presence of children?

- No
 Yes --

*If yes,***Do you do anything to reduce smoke** (e.g. open the window)?
_____**In your opinion to what extent does the smoke disturb the children?**

- 1 not at all
 2 a little
 3 moderately
 4 quite
 5 much

Where do you smoke in the presence of children?

- Only in a room designated for smoking / in the yard
 In shared rooms (kitchen, passage, etc.
 It happens that also in the group's room

2. What is your opinion about smoking in general? (evaluate from 1 to 5, check the appropriate box)?

*I fully reject it**I fully accept it*1 2 3 4 5

Please give the reasons for your opinion. (Why this is, when, how did it formed, did it change as the result of the Program, etc. ...)

NOW WE WOULD LIKE TO ASK A FEW THINGS ABOUT THE PARENTS:

3. In your view how the parents of the **children taking part in the Program received the Program?**

(Please check the appropriate box)

- (almost) all of them supported it
- the majority supported it
- the majority opposed it
- almost everybody opposed it
- they showed disinterest

4. Have you experienced **difference between smoking and non-smoking parents?**

(Please check the appropriate box)

- here was no difference**, it was supported in about the same proportion by smoking and non-smoking parents
- it was more supported by non-smoking parents
- it was more supported by smoking parents

5. In your view, on the basis of the children's reports and feedbacks: **did the home smoking habits of the parents change?**

(Please check the appropriate box)

- No
- Yes
- I don't know

6. Please **write down a few characteristic examples** on the change of the parents' behavior to the positive or (perhaps) in the negative direction.

THE FOLLOWING QUESTIONS ARE RELATED TO THE CHILDREN:

7. In your view what was the children's opinion about smoking itself....

... before the execution of the Program?

(Please evaluate it from 1 to 5 by checking the appropriate box)

fully rejected

fully accepted

1

2

3

4

5

... at the end of the Program?

(Please evaluate it from 1 to 5 by checking the appropriate box)

fully rejected

fully accepted

1

2

3

4

5

8. In which topics of the Program have you noticed an increase in the level of knowledge of the children?

(Please check the appropriate box. You may check several boxes here.)

- sensation
- personality
- health condition
- smoking

9. In your view, did the children understand during the activities the **meaning of the cherry symbol**?

(Please check the appropriate box)

- (almost) everybody understood it
- the majority understood it
- the majority did not understand it
- none of the children understood it

10. Do you know of any child(children) in the group who have already tried out smoking?

(Please check the appropriate box)

- No
- Yes --

If yes, please describe briefly the circumstances (with whom, where, etc. ...)

FINALLY WE WOULD LIKE TO ASK YOUR OPINION ABOUT THE PROGRAM:

11. Beside the actual program-sessions **have you used for other activities** the tools of the program box?

- No
- Yes --

If yes, please describe the activities.

12. Do you have any **colleague who did not participate in the Program?**

- No
- Yes --

If yes,

In your opinion does this colleague knows the Program's ...

(Please check the appropriate box)

... objective	<input type="checkbox"/> no	<input type="checkbox"/> yes
... tasks	<input type="checkbox"/> no	<input type="checkbox"/> yes
... activities	<input type="checkbox"/> no	<input type="checkbox"/> yes
... tools	<input type="checkbox"/> no	<input type="checkbox"/> yes

What reactions did you notice in general from the colleague(s) who did not participate in the Program?

(Please check the appropriate box. You may check more than one box here)

- they shown interest
- they supported it
- they took a liking to introduce the Program
- they were neutral
- they were ...

13. Please evaluate the educational material of the Program Box.

(Please check the appropriate box)

Serial number 7.1.1.1	Description	size	useful, needed	useful, but requires modification	can be omitted
1.	Sound recordings of Sound-collecting Peter	2x12 min. audio-cassette	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2.	Tale, series of slides (8 slides)	5x5cm slide	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3.	Do you want to quit smoking?	10.5x15cm booklet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4.	The health-damaging effects of smoking	15x21cm booklet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5.	Program Manual	21x29,7cm booklet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6.	Smoke sucker /pump-type demonstration tool/	20x5 cm smoke sucker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7.	No-smoking Area /cherry/	7x5cm sticker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8.	No-smoking Area /cherry/	10.5x15cm sticker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9.	No-smoking Area /cherry/	41x58cm poster	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10.	Thermal photo of the hand	58x41cm poster	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
11.	Pictures of the tale (8 pictures)	A/4-sized picture	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
12.	Smoker's mouth	12x16cm picture	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
13.	Smoking or Health! /cherry/	XL T-shirt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
14.	Puzzle /cherry/	78,5x10,5 cm puzzle	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
15.	Women and smoking	21x15cm flyer	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
16.	Program Box	30x25x35cm box	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
17.	Series of flat puppets /17 puppets/	29.8x21 cm flat puppets	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
18.	Cherry, /coloring picture /	A/4-sized pattern	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
19.	Pictures of the tale, 8 pc. /coloring pictures /	21x30 cm pattern	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

↓
What specific modifications do you propose?

Item no.:	Modifications
1.	
b	

15. Think of the **cherry symbol**. Was it liked by ...

(Please check the appropriate box)

	(almost) everybody liked it	the majority liked it	the majority did not like it	nobody liked it
... the children	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
... the parents	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

16. **What reasons were given** for liking/non-liking by the children/parents?

	<i>I like it because...</i>	<i>I don't like it because...</i>
children		
parents		

Thank you that by completing this questionnaire you help our work and contribute to the survival of the Program!

Appendix 10

DECLARATION 2

I hereby agree that the National Center for Health Promotion contact me in the future , even after several years, for the purpose of its long-term research work for its Smoking or Health Program

Readable signature:

Home address:

Phone number:

Your data, with respect to your personal rights, will be used only for research purposes.

Monitoring

National Center for Health Promotion
Budapest 1062 Andrásy út 82.
