

AGE RESTRICTION

FACTSHEET - 2014

Research on compliance with legal age restriction on sunbed usage

COMP LIANCE

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CHAPTER 1: BACKGROUND AND MOTIVATION

Sunbed use is particularly harmful to the health of adolescents. A report by the Scientific Committee on Consumer Products (SCCP) concludes that the risks of skin cancer (melanoma) appear to be higher when sunbeds – or other tanning devices using ultraviolet radiation – are used at a young age.¹ They therefore posit that sun beds should not be used by individuals under the age of 18. More recent research – based on 27 separate international scientific studies on skin cancer and sunbed use – shows that the risk of getting melanoma increased by 20% when individuals first use sunbeds before the age of 35. This risk is doubled when the individual has artificially tanned before the age of 35.² In other words: especially adolescents run considerable health risks by tanning on sunbeds.

The best method of protecting adolescents from these health risks is prevention; to ban the use of sun beds for adolescent under the age of 18. The effectiveness of strategies aimed at discouraging adolescents from using sun beds and/or strategies centred on parental consent, appear to be limited.³⁻⁴ Based on recommendations by, amongst others, the World Health Organisation and the European Society of Skin Cancer Prevention, Boniol, Autier, Boyle and Gandini advocate for a restriction of sunbed usage for individuals under 18.¹ That is, sunbed usage should not be possible for adolescents under the age of 18, simply by denying them access to tanning facilities.

Since mid-2007, various measures have been taken in The Netherlands to achieve the aforementioned goal. Firstly, the age restriction for sunbed usage at tanning studios and other tanning facilities – facilities where tanning is not their main business, such as swimming pools, nail salons, and fitness centres – is included in the European norm NEN-EN-IEC 60335-27. Proprietors and/or other responsible parties are obliged to include a statement in their instruction on sunbed usage, in which individuals under the age of 18 are discouraged from using sunbeds.⁵⁻⁶ Secondly, by mid-2007, Nederlandse Voedsel- en Warenautoriteit (NVWA - the Netherlands Food and Consumer Product Safety Authority) started informing sunbed manufacturers, importers, and dealers. This involves new products and products made available for use. Additionally, by mid-2008, the NVWA started inspecting tanning facilities and enforcing legislation when facilities were in violation. Thirdly, Samenwerking Verantwoord Zonnen (SVZ - Collaboration Responsible Tanning - trade association for tanning studios), started a campaign amongst its affiliated studios, in which sunbed usage of individuals under the age of 18 is discouraged. At the affiliated studios, age restriction is indicated at the counter. Furthermore, SVZ employs mysteryshoppers to examine whether adolescents are in fact prevented from sunbed usage.

However, the question to what extent the aforementioned measures have an effect on the prevention of sunbed usage by adolescents under the age of 18 in the Netherlands remains unanswered. There are indications that, in the Netherlands, individuals under 18 are to some degree admitted to tanning facilities, as described in an article by Kassa, entitled “Jongere kan nog steeds onder de kankermachine” (Adolescent still has access to the cancer machine).⁷ Excepting these indications not much is known. This research aims to remedy this; on the one hand to give the status quo on the current situation in the Netherlands, on the other hand to assess whether abovementioned measures are effective. The first research question is:

To what extent do staff members of tanning studios and other tanning facilities prevent adolescents under the age of 18 from sunbed usage?

In addition to this research question, various industry demographics are included. A distinction is made between three types of tanning facilities: tanning studios affiliated with SVZ, non-SVZ affiliated tanning studios and other tanning facilities (e.g. swimming pools, nail salons, fitness centres). This prompts the second research question:

Are there differences in the extent to which measures are taken by tanning studios affiliated with SVZ, non-SVZ affiliated tanning studios and other tanning facilities to prevent adolescents under the age of 18 from sunbed usage?

Lastly, this research is focused on the extent to which staff members advise the adolescents. The SCCP recommends staff members give personal advice on usage, aimed at reducing the risk of skin cancer as a result of UV-radiation for individuals who have a predisposition towards this, by means of an intake interview or an intake form.¹ This recommendation – as well as the aforementioned age restriction and intensity of UV-radiation a sunbed is allowed to generate – has been adopted by the NWWA.⁸ On this basis, the third research question is formulated:

To what extent and in what manner do staff members inform and advise adolescents under the age of 18 who have gained access to the tanning facility on sunbed usage?

CHAPTER 2: RESEARCH METHOD

In order to answer the research questions, the chosen method is that of 'mysteryshopping'. In the last few years this method has proved a well-founded and reliable means of examining compliance to legislation concerning age restriction. It is a straightforward method which exposes gaps that often remain hidden when using more indirect instruments, like run-of-the-mill inspections. The research is conducted by Nuchter's MysteryKids-teams. A team consists of a 16-year-old adolescent (male or female) and an adult auditor employed by Nuchter. They research the accessibility of tanning facilities to adolescents under the age of 18.

SELECTION

The tanning facilities selected for this research are spread out over four geographical regions: north, south, east, and west. These regions are representative of the Netherlands on the basis of urbanisation, and comprise both urban and rural areas. Approximately 2.950 tanning facilities are operational in the Netherlands, of which 450 are professional tanning studios (200 SVZ-affiliated and 250 non-affiliated) and 2.500 are facilities where tanning is not their main business. To be able to make comprehensive statements on different levels and to measure mean mutations in significant variations in future research, 322 tanning facilities were researched. Of these 322 facilities, 87 SVZ-affiliated studios, 93 non-SVZ affiliated studios, and 142 other tanning facilities were researched. The research took place in weeks 7, 8, and 9 of 2014.

GENDER DIVISION AND PLACEMENT MYSTERYKIDS

The gender of the MysteryKids was taken into account when allocating the facilities. The research has been conducted by male MysteryKids (40%) and female MysteryKids (60%), evenly spread out over the various types of tanning facilities (percentages indicated by SVZ). Besides gender, the MysteryKids' place of residence was taken into account. The Kids only visit facilities that are situated more than 20 kilometres from their own place of residence, in order to avoid recognition by staff members.

TIMES OF THE VISITS

The MysteryKids visited the tanning facilities at times that SVZ indicated adolescents normally visit tanning facilities: Thursday afternoon, Friday afternoon, and Friday evening.

DATA COLLECTION

The auditors involved in this study are assigned a MysteryKid. They receive a pre-planned route and a timeframe in which the MysteryKid has to attempt to gain access to the tanning facility. Background information on the auditors, preparation, follow up and on coaching the MysteryKids can be found in Appendix 1. The auditor drives to the facilities where the research, following a protocol, takes place. The most relevant elements of this protocol are described below. The complete protocol is available on request.

In view of the comparability of the research on compliance to legislation concerning age restriction, every MysteryKid asked the tanning facility's staff member the same opening question: "Can I use a sunbed?". In accordance with the staff member's reaction, the MysteryKids are instructed to respond

in a polite and friendly manner and follow the staff member's instructions. If the MysteryKid has to fill out an intake form, he or she does so truthfully. The same applies to age; if the MysteryKid is asked for his or her age, they give the staff member their actual age. If the MysteryKid is asked to show his or her identification card, he or she shows a valid identification card. When a staff member denies the MysteryKid access to the facility, the MysteryKids will never argue. When the MysteryKids gains access, he or she continues on to the cabin where the sunbed is located. Upon arriving at the cabin, the MysteryKid leaves the facility under some pretext. During this research, the auditor is inconspicuously present and closely observes the situation. In this manner, the research results are not solely dependent on the observations of a minor.

The adolescents never use the sunbeds.

DATA REGISTRATION

Upon completing the research at the facility, the auditor and the MysteryKid record the data. When that day's schedule is completed, the auditor will process the data digitally. The auditors have access to a digital platform specially developed by Nuchter, where all the details of that day's schedule are displayed and where the auditors have to register all the necessary details of the attempt at gaining access. The following data is registered: whether the MysteryKid gained access or not, the interventions of the staff member, the day, the time, payment method, the number of customers, the gender and age of the staff member, the presence of UV-glasses, and whether or not the MysteryKid could operate the sunbed him-/or herself (self-service).

In addition, the extent to and manner in which advice was given is registered. Four points of advice and four questions which the staff member should ask new sunbed users, have been determined. An overview of these points of advice and questions, including descriptions, has been included in Appendix 2.

RECORDING THE RESULTS

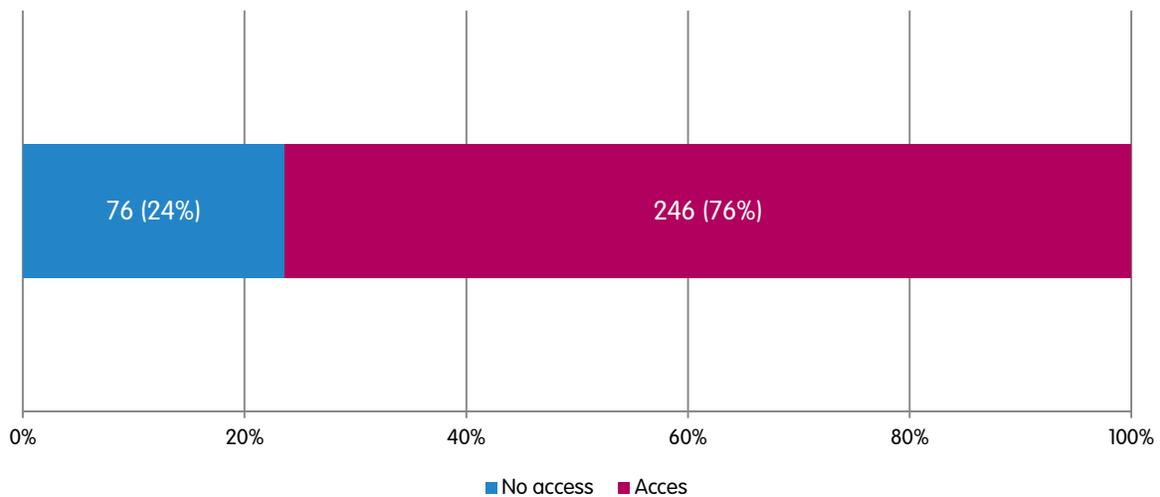
The statistical program SPSS was used to process and analyse the data garnered from this research. In the analyses, the general results are requested first, after which they are elaborated on in the report. Subsequently, these general results are divided according to type of tanning facility, and elaborated on in the report. Furthermore, additional analyses are requested to give more insight into the possible correlation between variables. Only the statistically significant correlations between variables are listed.

CHAPTER 3: RESULTS

OVERALL RESULTS

The total number of instances the MysteryKids were unsuccessful and successful at gaining access to tanning facilities is presented in Figure 1. The Figure shows that the MysteryKids were unsuccessful at 76 facilities and that they were successful at 246 facilities; amounting to 24% and 76% respectively.

Figure 1: Total acces to tanning facilities (N=322)



In Figure 2 (next page) the various types of interventions by staff members, including subsequent adherence to age restriction, are presented. The last two categories are combinations of used interventions. The combination 'ID-question' and 'checking the intake form' has not occurred in this research.

Figure 2 shows that staff members asked after the age of the adolescents at 20% of the facilities. Solely based on this intervention, access to the tanning facility is denied in 88% instances. At 36 facilities (11%), the MysteryKids had to fill out an intake form. At 24 out of the 36 facilities (67%), the form was checked. Based on this check, access to the tanning facility is denied 50% of the time. Adherence to age restrictions after checking the intake form amounts to 42%, and after checking the form in combination with the age it amounts to 58%. At 224 facilities there was no intervention; in all of these instances the MysteryKids gain access to the tanning facility. It is remarkable that based on asking the age of the adolescent (in total 79 times - 25%), the MysteryKids still gained access to 13 facility's (16%).

To be as comprehensive as possible, intervention type 'identification card requested' and the combined intervention 'age and identification card requested' are recorded in Figure 3. No further comments are made on these interventions, since the small amount of instances in which these intervention types occur, could be attributed to coincidence. This applies to all other figures.

Figure 2: Types of interventions and compliance (N=322)

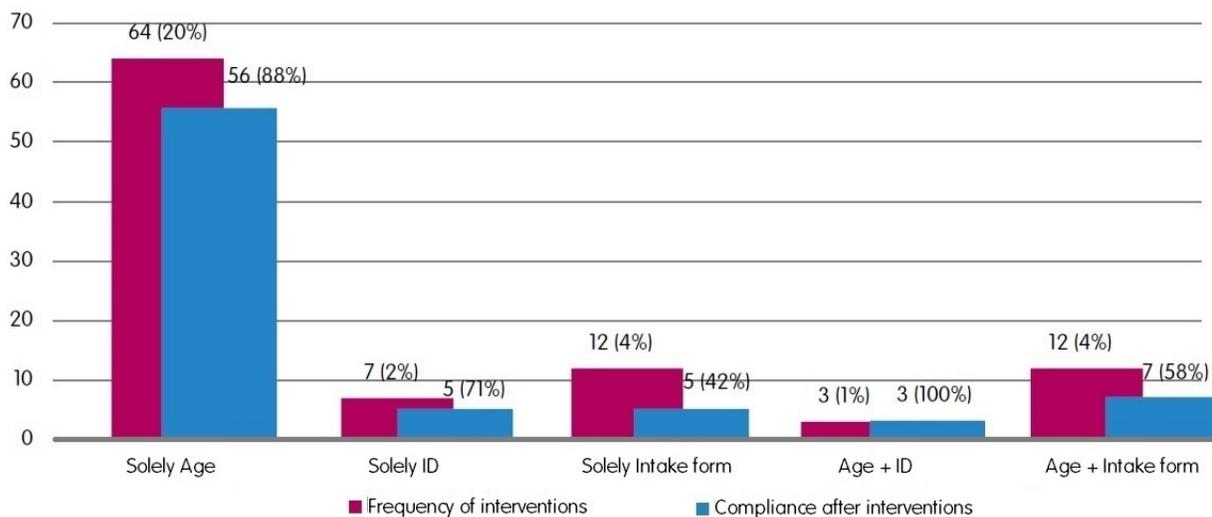


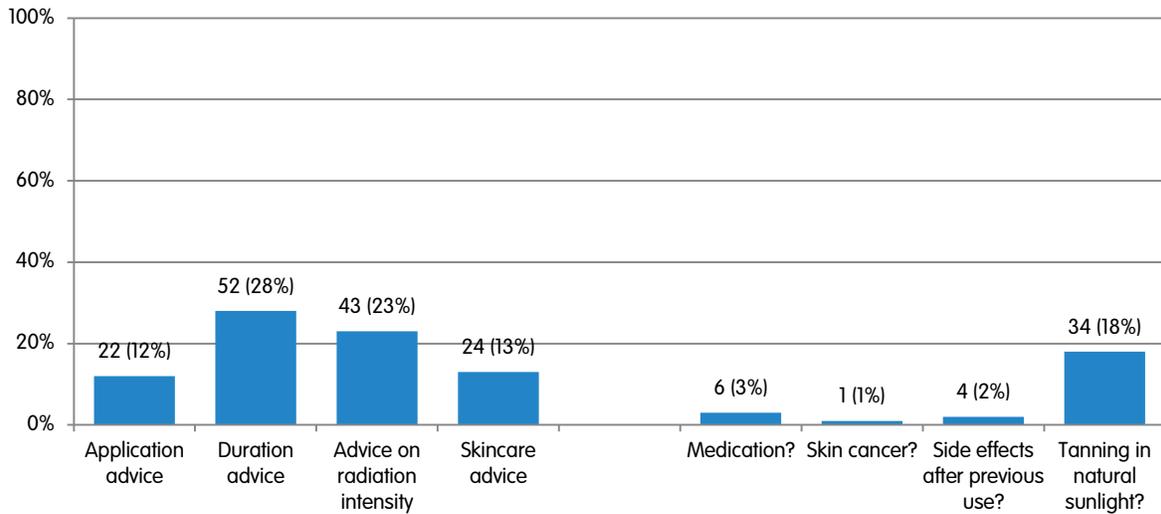
Figure 3 (next page) shows the four points of advice staff members gave (left in figure) and which four questions staff members should pose before initial sunbed usage. Since the MysteryKids are new to the tanning facility, staff members should walk them through all these points.

In addition to the 36 facilities where the MysteryKids had to fill out an intake form, they were verbally advised at 15 facilities (42% - 6% of the total amount of adolescents that gained access). Furthermore, at 55 facilities (22% of total access), the MysteryKids were solely verbally advised, without having to fill out an intake form. In short: at 70 facilities (28% of total access), the adolescents were verbally advised/informed by a staff member, in most instances concerning several points of advice and/or questions. In total, 186 separate points of advice/questions were brought up by staff members.

Figure 3 shows that in most instances (52 times, 28%), staff members give advice on the duration of tanning before initial sunbed usage. The point of advice least touched upon is applying nourishing cream before use (22 times, 12%). In the majority of instances staff members ask after tanning in natural sunlight (34 times, 18%). The least asked question is whether the adolescent has got (a history of) skin cancer. This was asked only once. Staff members also ask relatively little about medication and side effects after previous use.

Finally, of the 70 instances that verbal advice is given, all four points of advice – application, duration, radiation strength, and skincare – are given in 7 instances. It did not occur that a staff member asked all four questions – medication, skin cancer, side effect and tanning in natural sunlight.

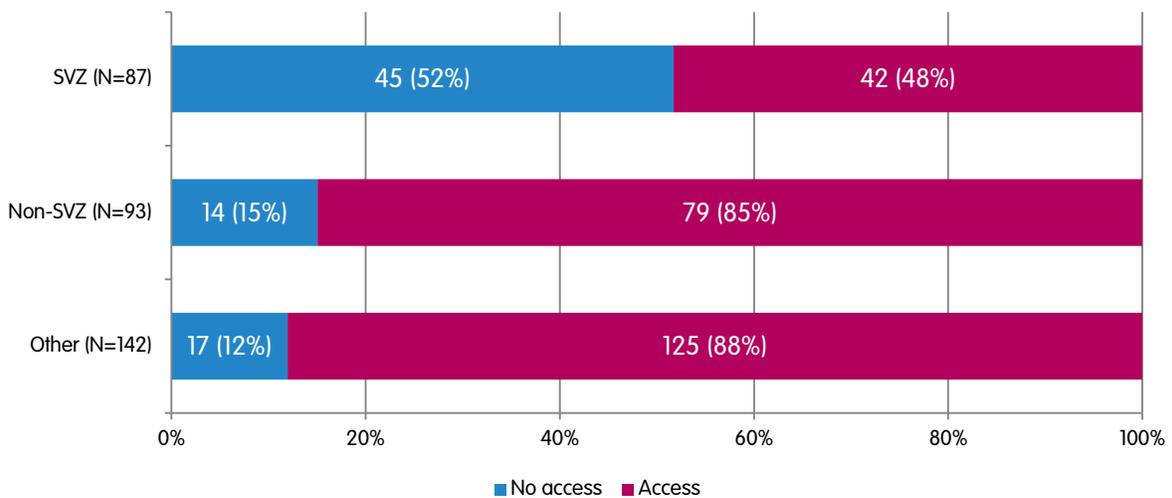
Figure 3: Advice/questions (N=186)



RESULTS PER TYPE OF TANNING FACILITY

Access to the various types of tanning facilities is presented in Figure 4. SVZ-affiliated facilities have the best score. MysteryKids are refused access at 45 facilities, and at 42 facilities they are permitted access. At the non-SVZ affiliated facilities the adolescents were refused access in 14 instances and at other tanning facilities they were refused in 17 instances.

Figure 4: Access tanning facilities per type of facility



In the following section each type of facility is discussed with respect to interventions and the extent and manner of advice given by staff members. Additionally, observations on payment method, presence (or lack thereof) of UV-glasses, and possibility of self-service, are described for each type of facility.

SVZ-AFFILIATED TANNING STUDIOS

The various types of interventions, including the subsequent adherence to the age restriction, employed by SVZ-affiliated tanning studios are presented in Figure 5. From the Figure can be deduced that at 32 facilities (37%), the staff member only asks after the age of the adolescent. Based on solely this intervention, access to the tanning facility is denied 94% of the time. The MysteryKids have filled out an intake form at 17 of the SVZ-affiliated studios (20%) and of these 17 instances, the form was checked in 11 instances (65%). Subsequently, based on this check, access is denied at 10 studios (91%). At 38 studios (44%), no interventions were made. In all these instances, the MysteryKids gained access to the tanning studio.

Figure 5: Types of interventions and compliance - SVZ (N=87)

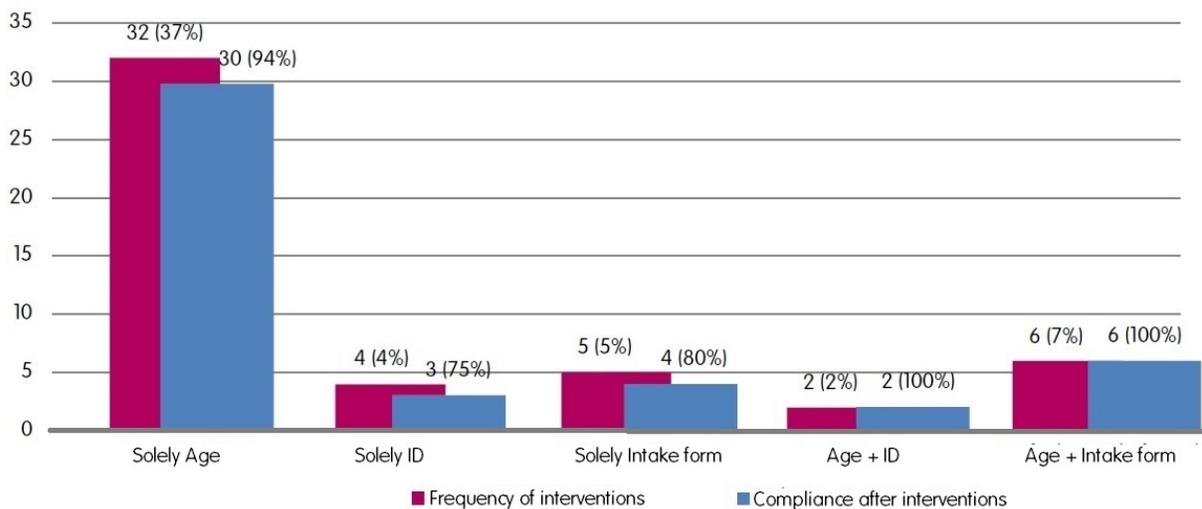
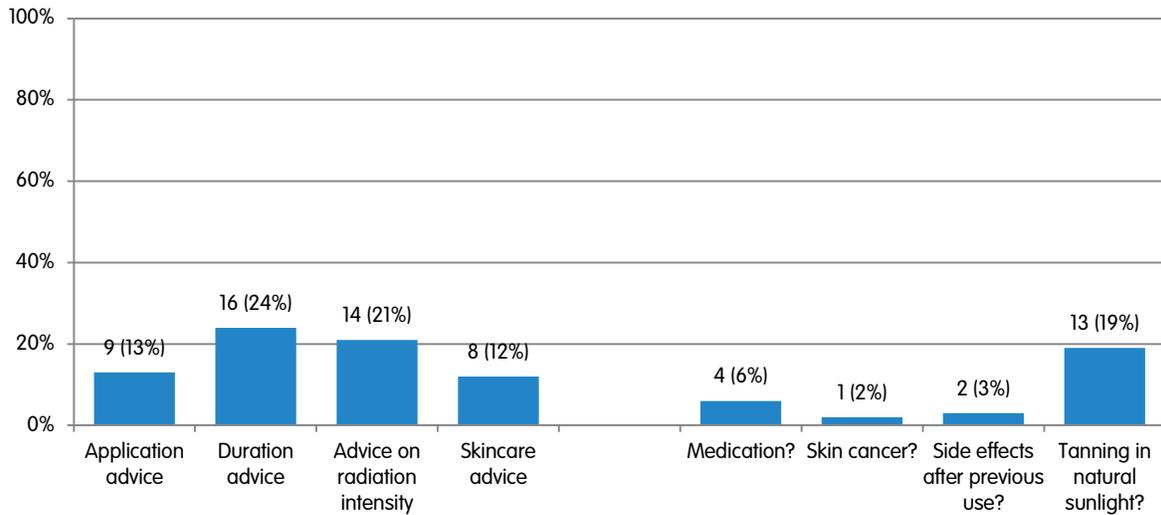


Figure 6 (next page) contains four points of advice and four questions, focused on SVZ-affiliated tanning studios. In addition to the 17 studios where the adolescents had to fill out an intake form, the MysteryKids were verbally advised at 5 studios (29%); which amounts to 12% of the total amount of MysteryKids that gained access to the SVZ-affiliated studios. Moreover, at 17 studios (40% of total access at SVZ-affiliated studios), the MysteryKids were solely verbally advised, without having to fill out an intake form. In short: overall, the adolescents were verbally advised by a staff member at 22 studios (52% of total access). In most instances, a staff member's advice covered a number of points of advice and questions. In total, 67 individual points of advice/questions were addressed.

The advice given most by staff members is advice on duration with initial sunbed usage (at 16 studios; 24%). This is followed by advice on tanning in natural sunlight (at 13 studios; 19%).

Figure 6: Advice/questions - SVZ (N=67)



The attempts to gain access were observed by the auditors. At 41 out of the 42 SVZ-affiliated studios that denied access to the MysteryKids, payment method was registered. One adolescent paid by purchasing coins from a machine. At the other 40 studios, the adolescents paid in cash or via debit card. Another observation concerns the presence of UV-glasses; at 31 studios UV-glasses were present. At 35 studios the adolescents could set the sunbed him-/herself (self-service).

NON-SVZ AFFILIATED TANNING STUDIOS

In Figure 7 the various types of intervention and adherence to age restrictions due to these interventions, are presented for non-SVZ affiliated tanning studios. At 15 studios (16%), staff members solely asked after the age of the adolescents. Based on this one intervention, access to the studio is denied at 11 facilities (73%). The MysteryKids had to fill out an intake form at 14 non-SVZ affiliated studios (15% of total access). In 9 out of 14 studios (64%), the form was checked. Consequently, access was denied twice (22%). At 68 studios no intervention was made; the MysteryKids gained access to these studios.

Figure 7: Types of interventions and compliance - non SVZ (N=93)

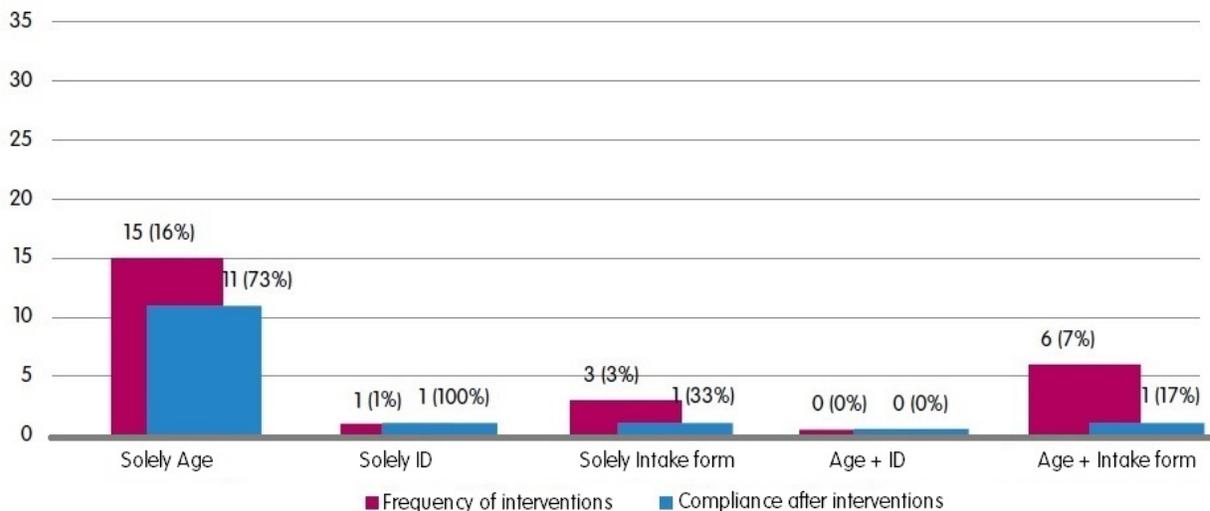
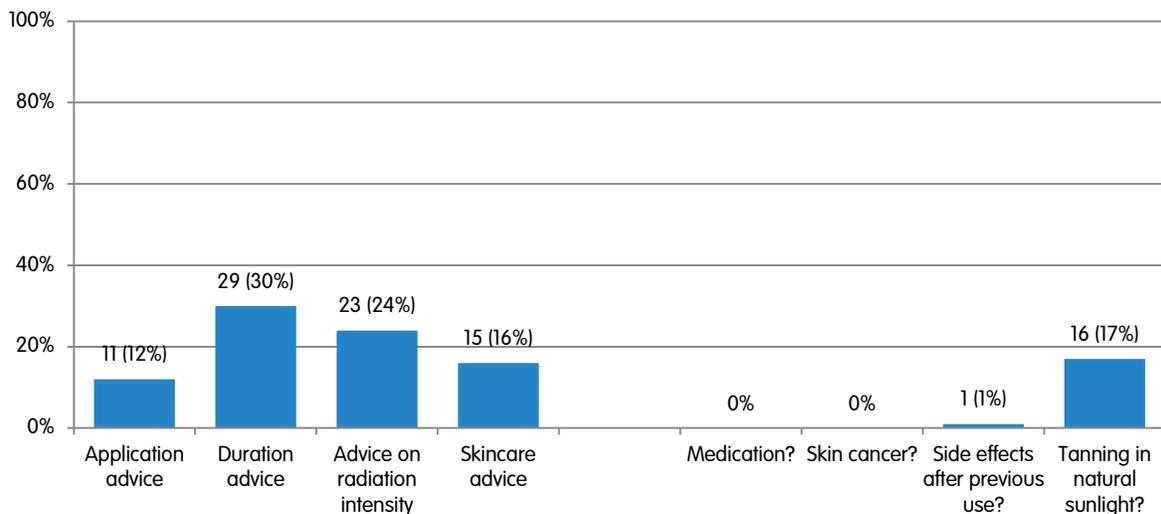


Figure 8 contains four points of advice and four questions, focused on non-SVZ affiliated tanning studios. In addition to the 14 instances where the adolescents had to fill out an intake form, they were verbally advised in 7 instances (50% - 9% of total access to non-SVZ affiliated studios). At 29 studios (37% of total access), the MysteryKids were solely verbally advised, without having to fill out an intake form. Overall, the adolescents were verbally advised/informed at 36 studios (46% of total access), where in most instances staff members gave advice on several of the points of advice/questions. In total, 95 individual points of advice/questions were addressed.

The Figure shows that advice on duration of tanning with initial sunbed usage is the advice most given by staff members (29 instances; 30%). This is followed by advice on tanning in natural sunlight (16 instances; 17%).

Figure 8: Advice/questions - Non-SVZ (N=95)



One observation is that at 7 out of the 79 non-SVZ affiliated studios the MysteryKids gained access to, payment was made by purchasing coins (in 4 instances from a machine, in 3 instances from a staff member). At the other 72 studios the adolescent paid in cash or via debit card. A second observation concerns the presence of UV-glasses. UV-glasses were found at 38 studios. Thirdly, at 64 studios the adolescents were able to set the sunbed themselves.

OTHER TANNING FACILITIES

From Figure 9 (next page) can be deduced that staff members asked after the age of the adolescent at 17 facilities (12%). Based on this intervention, access to the tanning facilities is denied in 15 instances (88%). The MysteryKids filled in an intake form at 5 facilities (4% of total). In 4 of these 5 instances (80%), the form is checked. Based on this check, no adolescents were refused access. At 119 of the facilities (84%), no intervention is used. The MysteryKids gained access to a sunbed at all these facilities.

Figure 9: Types of interventions and compliance - Other facilities (N=142)

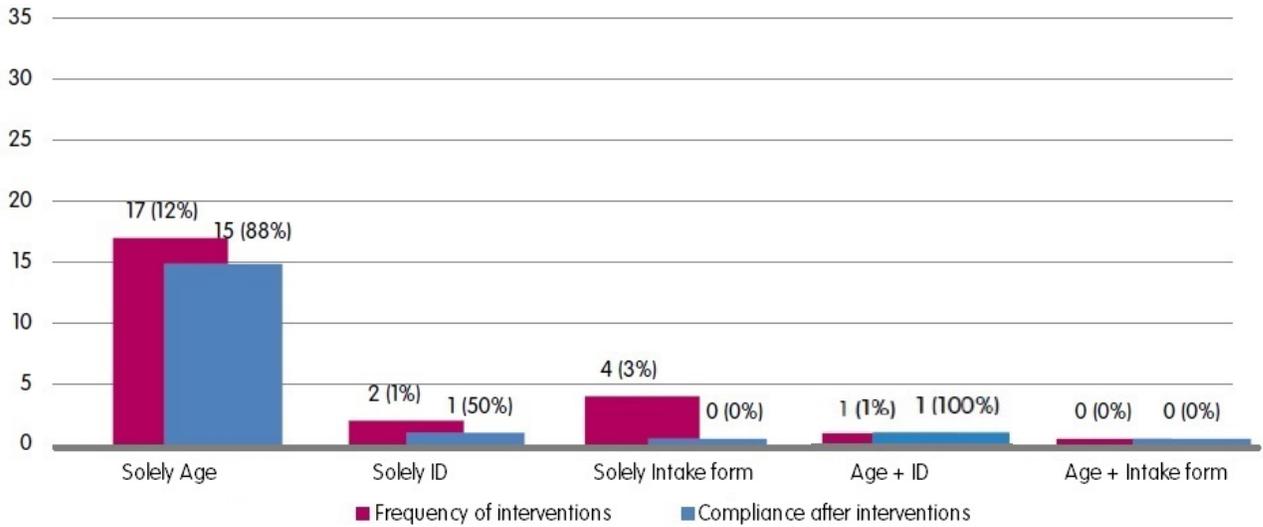
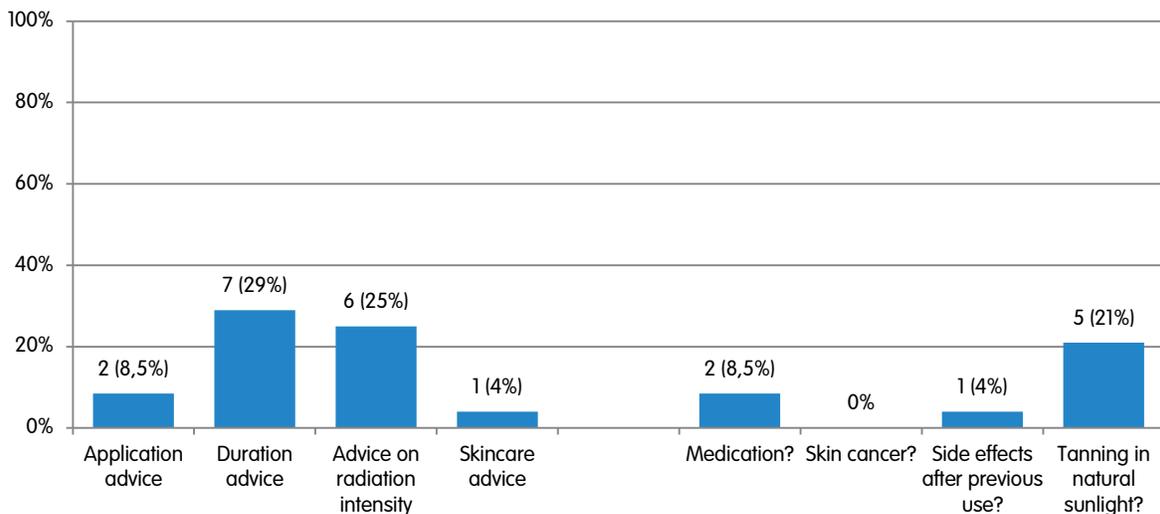


Figure 10 contains four points of advice and four questions with regard to the other tanning facilities. In addition to having to fill out an intake form at 5 facilities, the adolescents were verbally advised at 3 facilities (60% - 2% of total access). Furthermore, the MysteryKids were verbally advised at 9 facilities (7% of total access). Overall, the adolescents were advised/informed at 12 facilities (10% of total access), frequently on a number of points of advice/questions. In sum, 24 individual points of advice/questions were addressed.

The advice touched upon most (at 7 facilities; 29%) by staff members, is on duration of tanning with initial use. The question most frequently asked (at 5 facilities; 21%), is on tanning in natural sunlight.

Figure 10: Advice/questions - Other tanning facilities (N=24)



Observations were also made at these other tanning facilities. Of the 125 facilities that the MysteryKids gained access to, payment method was registered 124 times. At 25 facilities, payment was made using coins (in 7 instances these coins were purchased from a machine, in 18 instances from a staff member). At the remaining 97 facilities the adolescent paid in cash or via debit card (in 8 instances payment was made via a machine, in 89 instances payment was made to a staff member). At 36 of the 125 facilities the adolescents gained access to, UV-glasses were present. Lastly, at 100 out of the 125 facilities, the MysteryKids could set the sunbeds themselves (self-service).

ADDITIONAL RESULTS

Additional analyses were conducted in order to get insight into the extent to which variables are correlated. The independent variables in these analyses are: *gender* (gender of MysteryKid and staff member), *age* (the MysteryKid's estimation of the staff member's age; under or over 40) and the *population density category* (more rural area (category 4+5) and more urban area (category 1+2+3)). Whether there is a correlation between the gender of the MysteryKid and the gender of the staff member has also been analysed. A distinction is made between 'equal' (female-MysteryKid and female staff member, male-MysteryKid and male staff member) and 'unequal' (female-MysteryKid and male staff member and vice versa). The dependent variables are: *access* and *intervention*. The variable intervention is made up of all the separate types of intervention – the occurrence of each type of intervention is too small to be considered separately. In order to test to what extent these variables are correlated, cross tabs and their Chi Square were requested. Below, we discuss the correlation between variables that have statistical significance.

First of all, the gender of the staff member proves to have a significant influence on access (X^2 4,6348; $p < .05$). Female staff members deny the MysteryKids access to the tanning facilities more frequently than male staff members. Secondly, the gender of the staff member is also of significant influence on intervention (X^2 8,8403; $p < .05$). Female staff members intervened more regularly than male staff members.

Thirdly, the age of the staff member proves to be of significant influence on access (X^2 5,5198; $p < .05$). Staff members with an estimated age below 40 years of age permitted the MysteryKids access relatively less often than staff members estimated to be over 40 years of age. Lastly, the age of the staff member also proves to be of significant influence on interventions (X^2 7,4622; $p < .05$). Staff members estimated to be younger than 40 made interventions more often than staff members estimated to be over 40.

Other researched variables in these additional analyses do not have a significant effect on access and/or intervention.

CHAPTER 4: CONCLUSIONS

The first conclusion to be drawn from this research is that only a quarter of the adolescents under the age of 18 is prevented from sunbed usage at tanning studios and other tanning facilities. In other words: 75% of the time no preventative measures are taken – in 69% of instances there were no interventions at all – and the majority of adolescents are not protected from the health risks inherent in sunbed usage at a young age.

The second conclusion that may be drawn when we zoom in on the industry demographics, is that the prevention percentages for SVZ-affiliated studios, non-SVZ affiliated studios, and other tanning facilities (where tanning is not their main business) differ greatly. At SVZ-affiliated studios more than half of the adolescents are prevented from sunbed usage. At non-SVZ affiliated studios and other tanning facilities the prevention percentage is below 15%; there was no intervention in respectively 73% and 84% of the instances. For SVZ-affiliated studios this amounts to 44%. Thus, the SVZ-affiliated studios are the facilities that are most likely to undertake action and where, in most instances, adolescents are prevented from sunbed usage.

The third and last conclusion that may be drawn is that adolescents are insufficiently informed and advised before initial sunbed usage. In 91 of the instances (28%), the adolescents are advised/informed on sunbed usage via an intake form or verbal advice. Moreover, verbal advice and questioning by staff members is insufficient; there is not a single instance in which all the advice/questions have been addressed.

On the one hand we can deduce from the abovementioned conclusions that there is room for improvement. We base this on the limited total percentage of adolescents actually prevented from sunbed usage, the limited extent to which was intervened, and the significant number of tanning facilities where the adolescents who gained access where not advised or informed. On the other hand, it can be concluded that this research is a step in the right direction. This research gives a precise and reliable status quo of the adherence to legislation concerning age restrictions. On this basis, direct measures can be taken. A lesson can be drawn from the measures SVZ has implemented at SVZ-affiliated tanning studios. The data from the SVZ-affiliated studios demonstrate that the measures concerning age restriction are effective. When these measures – possibly in an intensified form – are also implemented at non-SVZ affiliated tanning facilities, improvements are possible and adolescents will be more effectively protected against health risks inherent in sunbed usage at a young age.

REFERENCES

1. Scientific Committee on Consumer Products. Opinion on biological effects of ultraviolet radiation relevant to health with particular reference to sunbeds for cosmetic purposes. 2006: 30. Available from: http://ec.europa.eu/health/scientific_committees/opinions_layman/en/sunbeds/about-sunbeds.htm. Accessed 2014, April 5th.
2. Boniol M, Autier P, Boyle P, & Gandini S. Cutaneous melanoma attributable to sunbed use: Systematic review and meta-analysis. *BMJ* 2012;345:1-12. doi: 10.1136/bmj.e4757
3. Schneider S, Kramer H. Who uses sunbeds? A systematic literature review of risk groups in developed countries. *J Eur Acad Dermatol* 2010;24:639-648. doi: 10.1111/j.1468-3083.2009.03509.x.
4. Mayer JA, Woodruff SI, Slymen DJ, Sallis JF, Forster JL, Clapp EJ, Gilmer T. (2011). Adolescents' Use of Indoor Tanning: A Large-Scale Evaluation of Psychosocial, Environmental, and Policy-Level Correlates. *Am J Public Health* 2011;101:930-938. doi: 10.2105/AJPH.2010.300079.
5. Nederlandse Voedsel- en Warenautoriteit. Zonnebanken - wetgeving. 2014. Available from: <https://www.vwa.nl/onderwerpen/consumentenartikelen/dossier/zonnebanken/wetgeving>. Accessed 2014, April 5th.
6. Nederlandse Voedsel- en Warenautoriteit. Zonnebanken - normen. 2014. Available from: <https://www.vwa.nl/onderwerpen/consumentenartikelen/dossier/zonnebanken/normen>. Accessed 2014, April 5th.
7. Geleijnse A. Jongere kan nog steeds onder de 'kankermachine'. *Kassa* 2014. Available from: <http://kassa.vara.nl/tijdschrift/artikel/nieuws/zonestudios-sjoemelen-met-leeftijdsgrens/>. Accessed 2014, April 5th.
8. Nederlandse Voedsel- en Warenautoriteit. Zonnebanken - wat moeten ondernemers doen? 2014. Available from: <https://www.vwa.nl/onderwerpen/consumentenartikelen/dossier/zonnebanken/wat-moeten-ondernemers-doen>. Accessed 2014, April 5th.

APPENDIX 1: COACHING, PREPARATION, AND FOLLOW UP

AUDITORS

The auditors employed by Nuchter are selected on the basis of their background and expertise. The team of auditors consists of former NVWA -inspectors, policemen, teachers, youth workers and addiction experts. All auditors possess a Verklaring Omtrent Gedrag (VOG - Certificate of Good Conduct), a car approved by periodic motor vehicle inspection and the necessary insurances in order to accompany the MysteryKids. The team of auditors is regularly retrained and frequently exchanges experiences in peer meetings organised by Nuchter. During these meetings research protocol is discussed; all auditors receive this protocol to be used as vademecum during research.

MYSTERYKIDS

It is of the utmost importance that the MysteryKids get intensive guidance before, during and after conducting the research. In this appendix we describe the complete procedure. This procedure is put in place to prevent the MysteryKids from suffering adverse effects due to their actions.

RECRUITMENT AND SELECTION

Adolescents who want to take part in the research as a MysteryKid need to fill out an application form noting the following: name, date of birth, height, address and telephone number in case of emergencies. In addition, the adolescents need to list the school they attend. They also have to include a recent photo in their application. Nuchter possesses a judging committee that, on the basis of the submitted application forms, selects adolescents who look like typical 15 or 16-year-olds.

BRIEFING

When an adolescent is selected, he or she receives a welcome package from Nuchter at their home address. This package consists of a brochure explaining what Nuchter does and what sort of work the adolescent will be doing for Nuchter. The welcome package also contains information for the parents. Preceding the research, a meeting is organised where all the MysteryKids meet their adult coach, the auditors, and each other. This meeting is also intended to introduce the MysteryKids to their job and to prepare them for the nature of that job. A prevention worker will lead an interactive discussion with the MysteryKids about the law and the risks of tanning at a young age.

COACHING

During the research, the MysteryKids are coached by auditors. The auditors pick up the MysteryKids and bring them to various facilities. The auditor is inconspicuously present and observes the attempt to gain access from a strategic vantage point. After visiting the tanning facilities, the MysteryKids are returned home by the auditors.

DEBRIEFING

When research is concluded, all of the MysteryKids meet for a debriefing. During this meeting the results are discussed and the MysteryKids get the chance to share their experiences. With the guidance of a prevention worker these experiences can be put into perspective. The adolescents may

have found that it was easy to get access to a tanning facility. By recalling the risks of tanning for adolescents discussed in the briefing and viewing these risks in light of the possibly easy access, discussion is generated. In this discussion the importance of age restrictions and the importance of the job the MysteryKids do are underlined. On the one hand they discuss the importance of the existence and enforcement of age restriction. On the other hand it is put forward that the research the adolescents do is an important measure in fixing these problems.

The MysteryKids are in daily contact with each other and Nuchter's employees via Nuchter's specially designed social media channel. This channel functions as monitor and as discussion forum where the MysteryKids can share their experiences.

PARENTS

Parents play a vital part in the work Nuchter's does. They play a significant role in coaching their children during their work. A consent form is included in the welcome package the adolescent receives. This form gives insight into their child's job. Via this form, parents give their explicit consent to the research their child will be conducting for Nuchter. To permit the adolescent to work during the evening, the parents need to fill out another consent form.

A parental brochure is included in the welcome package. In this brochure the risks of tanning for adolescent are related, as well as the importance of strict societal rules for access to tanning facilities. The link between restrictions applicable outside of the home and the restrictions imposed on the child by the parents themselves is explicitly made.

Preceding a day of research, the MysteryKids are picked up at home by an auditor. Upon arriving at the MysteryKid's home, the auditor discusses diverse aspects of the research with the parents. Upon returning the MysteryKid to their home, the auditor again converses with the parents. Among other things, the number of instances the MysteryKid gained access to tanning facilities and the way the adolescent experienced this is discussed.

APPENDIX 2: ADVICE AND QUESTIONS

Advice:

- ✓ *Application advice*; did the staff member give advice on the application of nourishing cream before use?
- ✓ *Duration advice*; did the staff member give advice on duration of tanning?
- ✓ *Advice on radiation intensity*; did the staff member give advice on the radiation intensity that may be set?
- ✓ *Skincare advice*; did the staff member give advice on the sensitivity of various skin types to (artificial) radiation?

Questions:

- ✓ *Medication*; did a staff member ask the MysteryKid about use of medicines which increase sensitivity to UV-radiation?
- ✓ *Skin cancer*; did a staff member ask the MysteryKid whether he/she has skin cancer or has a history with skin cancer?
- ✓ *Side effects after previous use*; did a staff member ask the MysteryKid whether he/she has had side effects (itching, peeling) after sunbed usage in the past?
- ✓ *Tanning in natural sunlight*; did a staff member ask the MysteryKid whether he/she gets a tan in natural sunlight?

Nuchter

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