

The development and evaluation of a smoking cessation referral aid for the primary care setting

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IMPACT PARAGRAPH

Research is only effective and can have an impact when its results can be used, either in practice or as a springboard, for further research. The aim of the studies described in this dissertation was to increase the referral of smoking patients to EBSCIs. We wanted to achieve this by educating PCPs on the availability, usability, and effectiveness of EBSCIs and by facilitating the referral process to EBSCIs. We therefore developed a referral aid (RA) called the “StopWijzer” (which can be translated as “Stop guide” or “Stop smarter”). The referral aid (RA) did not change smoking cessation rates – which may be due to the fact that in both conditions effective care was provided by the PCPs and to the small sample size in the randomized controlled trial. The results did show that motivated smokers appreciated the RA suggesting that for implementation of such tools may a relevant impact on smokers motivated to quit to aid smoking cessation decision making.

Research aim

Our research showed us that PCPs expressed interested in receiving and using an overview of available EBSCIs, because they felt that they lacked knowledge on the subject, but also that they had little time in their counseling sessions to provide extensive counseling (Chapter 2). However, PCPs’ use of the RA during our randomized controlled trial was low (described in chapter 3), resulting in a low recruitment rate of smoking patients (chapter 4). Therefore, we were unable to identify effects of the RA on smoking abstinence. Despite low adherence and high rate of attrition, the RA was received well by both PCPs and smoking patients and there was a trend toward more referral and use of EBSCIs in the experimental condition. An additional study on the intention to adopt the RA among PCPs, as described in Chapter 5, confirmed this positive appreciation of the RA. However, it also revealed that a large proportion of the PCPs surveyed had no intention of adopting the RA, which was influenced by a more negative attitude toward the advantages of the RA caused by lower self-efficacy and perceived barriers such as a lack of time. Further research suggested that the use of (decision) aids that aim to facilitate the decision-making process underlying the choice between several EBSCIs has the potential to bring about behavior change (i.e., smoking cessation – Chapter 6). Lastly, we tested the usability of an adapted standalone version of the RA among a group larger group of smokers (see Chapter 7). Most participants found the DA only moderately usable, though those who found it more usable often had a higher intention to quit. Based on the results of that study, recommendations to implement the RA for smokers motivated to quit were made. Additionally, recommendations to make the materials more usable and valuable for smokers not motivated to quite were made, such as motivational techniques, tailoring, using video-based information, and including value clarification methods. Furthermore, a hybrid variant was suggested where smokers could use the DA

APPENDICES

independently and under the guidance of a PCP, which could aid both groups to choose an appropriate EBSCI option. Further research is needed to explore the possibilities of such a hybrid variant.

Relevance of the results

Practical relevance

First, as the RA was appreciated by smokers motivated to quit, implementation of such a guide may help this group to aid smoking cessation decision making. Second, the RA may also help PCPs to identify EBSCI's and to attune them smokers' needs. Yet, as its use in our RCT was still low, additional studies are needed on how to improve the RAs use in practice, e.g., by also including the RA in regular smoking cessation training programs. Third, as the RA was not optimally appreciated by smokers not motivated to quit, additional strategies to optimize the RA may be needed, such as including motivational elements tailored to the preferences and needs of this specific group.

Scientific relevance

We hoped that use of the RA could improve smoking cessation rates. Yet, we did not find this, potentially also because current care in both conditions of PCPs were sufficient. Testing the efficacy of the RA among those not using EBSCI's might be a next step, as one would hope that usage of the RA would lead to more use of EBSCI's. We also aimed to determine the potential factors facilitating and hindering the effectiveness and possible adoption and implementation of the RA. Although we were only able to provide some preliminary insights into the effects of the RA on smoking abstinence and EBSCI use, we were able to formulate conclusions about factors relevant for the daily practice in the PCS (e.g., the facilitators and barriers for using a DA within the limited timeframe of a counseling session). We also explored the possibilities of further developing the RA to make it possible to use it as a standalone version or as a part of 'blended care' (i.e., a combination of face-to-face counseling and web-based care), which can be used to reach a broader range of smokers willing to quit smoking.

Societal relevance

As tobacco use increases the risk of developing cancer and cardiovascular and pulmonary diseases, the burden of smoking in society remains enormous. The RA is of societal relevance, as it may help motivated smokers to find the most effective and preferred method to quit smoking, both among smokers individually as well as among smokers quitting with the aid of professionals. Additionally, it is of relevance as it provides PCPs a concise way to identify EBSCI's. Implementation of such tools in training programs of PCP's is thus recommended in order to facilitate identifying the relevant EBSCI's for smokers in their practice. By also paying special attention to groups with smoking-related complaints (which

accounted for approximately 50% of our sample), we aimed to increase smoking cessation success rates in this group, thus contributing to the decrease of the health divide in society. Yet, in order to optimize societal use, further implementation strategies are needed to target more smokers, also those who are unmotivated to quit yet to quit smoking, to increase societal impact.

Involving target groups

We identified three major target groups who can draw lessons from the outcomes of our study: (1) the PCS, as represented by PCPs; (2) the research field of smoking cessation care in the PCS, as represented by scientific researchers; and (3) society, as represented by policy makers in the field of prevention and professionals in the field of health insurance.

Involving the primary care setting

The PCS plays an important role in providing smoking cessation care at the individual level. Not only does the PCS have a wide reach but also a unique position, possessing the skills and knowledge to offer smokers the support they need to undertake a successful cessation attempt. Here, the first step is asking each patient whether they smoke (ask), advising smokers to quit (advice), and providing support to smokers who want to undertake a quit attempt (refer) based on the Dutch guidelines for smoking cessation care in the PCS. The RA described in this dissertation played a role in the referral part of this strategy by providing PCPs with an overview of the available EBSCIs. PCPs should also be aware of the vital role they play in engaging smokers with a lower SES or smoking-related complaints, as these group often have lower self-efficacy to ask for help.

To embed the findings of our research project within the PCS in a way that optimizes its impact, the active involvement of potential end-users during all phases of the development and diffusion of an intervention is required to ensure feasibility and effectiveness. Although we tried to include the PCS by using principles of co-creation (i.e., one-on-one interviews briefly mentioned in Chapter 3 and the Delphi study described in Chapter 2), to truly explore PCPs' needs and potential facilitators and barriers relevant for the RA, a more bottom-up approach may be needed. To enable true co-creation in further research, the constitution of a smoking cessation care working group may be considered. This group should include multiple potential end-users from the PCS, such as general practitioners and PNs, practice managers, and policy advisors from a wide array of PCSs, who should be involved in the various research phases whenever possible. Involving end-users from the start of a project would not only help to bridge the gap between daily practice and scientific research but may also facilitate motivation to adopt or to participate in associated research.

Involving the scientific community

To increase scientific impact, it is important to reach smoking cessation researchers in general and those in the field of smoking cessation care based in the PCS (i.e., those who develop smoking cessation interventions or guidelines with the aim of improving smoking cessation care in the PCS). At the time of writing, all studies included in this thesis had been submitted to or published in international peer-reviewed journals. Some findings described in this dissertation have also been presented and discussed at (inter)national congresses focused on smoking cessation, primary care, or decision making. Naturally, we will continue to try to involve researchers in the field of smoking cessation by reporting the findings of our studies via peer-reviewed and – when possible – open-access research journals. We recommend the field of research to actively look for solutions for the discovered barriers in this field. In addition to interventions targeting the PCS, we should also aim to increase the amount of evidence-based and structurally available EBSCIs, especially in the form of eHealth and mHealth.

Furthermore, the RA described in this dissertation and the insights provided by our research can perhaps be useful for the developers of the (Dutch) smoking cessation guidelines for the PCS. Although the guidelines currently recommend referring smokers to EBSCIs, they do not specify how this can be done in effectively and efficiently. The RA described in this dissertation can be used to improve the information provided by the guidelines or as a foundation for more specific information dissemination.

Involving society

The last important group that needs to be included to make the RA more suitable for widespread implementation in daily practice, is policy makers in the field of prevention and health promotion and professionals in the field of health insurance. As the Dutch proverb goes, prevention is better than cure. Next to preventing the younger generation to start smoking, the measures described in the National Prevention Agreement are mostly aimed at discouraging smoking among existing 'healthy' smokers to prevent them from developing smoking-related complaints. Smokers who seek to quit smoking, including those who are still relatively healthy (i.e., have not yet developed smoking-related complaints), should be able to receive smoking cessation aid, either as counseling or in a different form, as also endorsed by the RA. Policy makers should aim to facilitate smoking cessation counseling in the PCS by, for example, increasing reimbursements for counseling smoking patients, even when they do not have smoking-related complaints. To lower the threshold for a successful quit attempt even further, smokers should be provided with unlimited access to EBSCIs without it having to count towards the yearly deductible set by health insurers. Therefore, we recommend full reimbursement of evidence-based smoking cessation care and interventions to improve access to evidence-based help to quit and increase the use of EBSCIs when undertaking a cessation attempt.

In conclusion, our RA is one of the first attempts to guide both PCPs and smokers in identifying the optimal smoking cessation strategy for the smoker to quit smoking. Whereas the RA (also) targeted smokers who are not highly motivated to quit, it may be more practical and effective to use the RA for smokers who are motivated to quit. Despite indications showing positive evaluations concerning the RA's usability, strategies for identifying factors that facilitate its use by PCPs and smokers are essential to be able to demonstrate the beneficial effects of the use of such RAs on smoking cessation rates.