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Position Paper on the Elimination of HPV-Related Cancers in Germany

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Summary

Core Statement:

Cancers caused by Human Papillomavirus (HPV) can be avoided – through targeted vaccination and effective early detection. Germany has the medical and structural prerequisites to eliminate them. What is missing is a political framework – an HPV strategy by the Federal Government that coordinates and structures this process.

Our Recommendation:

Germany needs a nationwide coordinated, holistic strategy that consistently links vaccination, cervical cancer screening, and the perspective of those affected. This is based on the objectives of the EU and the WHO, to which Germany has committed itself and according to which we must orient our national actions. The measures developed in the **five fields of action** must be implemented quickly, systematically evaluated, and continuously monitored. They aim to prevent avoidable deaths and severe, long-term disease progressions, reduce health costs in the long term, and visibly demonstrate Germany's commitment to international obligations.

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About ZERVITA

ZERVITA is a nationwide information and education center dedicated to the prevention of HPV and HPV-related cancers. As an evidence-based information platform, we provide the public with independent, target-group-specific information on HPV vaccination and cervical cancer screening.

Founded in 2006, the project group — supported by 21 scientific medical societies, professional associations, and cancer organizations — has been strengthening public health literacy for many years. Through the comprehensive website www.zervita.de, ZERVITA addresses not only the general public but also adolescents and healthcare professionals as target groups and provides practical information materials.

Since 2014, this work has been institutionally supported by the non-profit association ZERVITA e. V. In doing so, ZERVITA makes an important contribution to strengthening prevention and sustainably reducing HPV-related cancers in Germany.

ZERVITA e.V.

Chairman: Prof. Dr. Thomas Iftner
Stuttgart Local Court, Registration No.: 21AR7599/14 / Tax number, Tübingen Tax Office: 86167/94328
Elfriede-Aulhorn-Str. 6, 72076 Tübingen
Email: info@zervita.de
www.zervita.de

About the ACCESS Consensus Group

The Advancing Cervical CancEr ScreeningS (ACCESS) International Consensus Group on Cervical Cancer brings together experts in women's health, with a particular focus on cervical cancer from clinical, epidemiological, academic, patient-centered, and health policy perspectives.

Together, we review the currently available evidence on optimal strategies for cervical cancer screening in countries with organized screening programs and issue recommendations to relevant stakeholders and policymakers in order to strengthen women's health by increasing screening participation among women who have so far been underserved.

ACCESS International Consensus Group
Email: secretariat@accesscg.org
www.accesscg.org

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This paper is the outcome of a round table of the National Strategy Forum for Combating HPV-Related Diseases, which took place in Frankfurt on 23 and 24 July 2025. Participants included ZERVITA, the ACCESS Consensus Group, and experts from academia, clinical practice, affected individuals and patient organizations, as well as civil society in the field of HPV prevention. The paper is intended as a stimulus for a broader political dialogue on strengthening HPV prevention in Germany.

Note on language use: *For reasons of readability, linguistic clarity, legal precision, and general comprehensibility, this paper predominantly uses the masculine form. In the sense of the generic masculine, it refers to all genders. Special characters (e.g. *, :, _) have been avoided, as they are currently not part of the official rules of German orthography.*

AUTHORS

1. **Ingetraud Bönte-Hieronymus**, Kopf-Hals-M.U.N.D.-Krebs e. V. / UTA („Unterwegs trotz alledem“)
2. **Dr. Sabine Dominik**, Pathologin & Gynäkologin, MVZ Institut für Pathologie & Zytodiagnostik Main-Taunus
3. **Prof. Tanja Fehm**, Universitätsklinikum Düsseldorf
4. **Dr. Thomas Fischbach**, Kinder- und Jugendarzt, Solingen & Berufsverband der Kinder- und Jugendärzt*innen e. V.
5. **Prof. Dr. Monika Hampl**, Gynäkologin, Köln
6. **Dr. Volker Heinecke**, Gynäkologe, Bad Urach, Berufsverband der Frauenärzte e. V. & 2. Vorsitzender von ZERVITA e. V.
7. **Prof. Dr. Melanie Henes**, Gynäkologin, Universitätsklinikum Tübingen & Schatzmeisterin von ZERVITA e. V.
8. **Prof. Dr. Thomas Iftner**, Virologe, Universitätsklinikum Tübingen & 1. Vorsitzender von ZERVITA e. V.
9. **Claudia Jasper**, Patientenvertretung, Frauenselbsthilfe Krebs Bundesverband e. V.
10. **Dr. Volkmar Küppers**, Privatdozent & Gynäkologe, Düsseldorf
11. **Andrea Mais**, Ärztin, Ärztliche Gesellschaft zur Gesundheitsförderung e. V. (ÄGGF)
12. **Dr. Ellen Mann**, Universitätsklinikum Rostock
13. **Heike Maurer**, Patientenvertretung, Tübingen
14. **Dr. Michèle Menkor**, Geschäftsführerin ZERVITA e. V.
15. **Dr. Frederik Stübs**, Gynäkologe, Uniklinikum Erlangen

Mrs. Dr. Marianne Röbl-Mathieu, Chair of the Measles / Rubella / HPV Working Group of the National Vaccination Steering Committee (NaLI), contributed her expertise to the preparation of this paper and supports the objectives set out therein.

SUPPORTERS

Zervita e. V.

Nationales Aktionsbündnis Impfen e. V.

ACCESS Consensus Group

Berufsverband der Frauenärztinnen und Frauenärzte e. V.

Ärztliche Gesellschaft zur Gesundheitsförderung e. V

Arbeitsgemeinschaft für Zervixpathologie und Kolposkopie e. V.

Kopf-Hals-M.U.N.D.-Krebs e. V.

Frauenselbsthilfe Krebs – Bundesverband e. V.

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SET THE COURSE NOW

Germany is at a health policy turning point. The scientific evidence on the effectiveness of HPV vaccination and cervical cancer screening is clear. International momentum shows that the elimination of HPV-related cancers is possible — not at some point in the distant future, but within a foreseeable timeframe. And yet, Germany still lacks binding political measures to achieve this goal. This gap can and must be closed.

ZERVITA, the ACCESS Consensus Group, and the co-signatories listed above* call on the legislature, the Federal Government, and the self-governing bodies of the healthcare system: Let us now use the knowledge already available to jointly implement structured, equitable, and sustainable prevention of HPV-related cancers — …"*because we can*."

Why act now?

- Around 10,000 people in Germany develop cancer caused by HPV (human papillomaviruses) each year [1], and 3,000 people die from it annually [2].
- Many of these cancers, such as cervical cancer, cancers of the mouth and throat, and penile, vaginal, and anal cancers, can be effectively prevented through HPV vaccination recommended by STIKO and through screening examinations.
- The World Health Organization (WHO) and the European Union (EU) aim to significantly reduce HPV-related cancers by 2030 — a goal to which Germany has also committed itself [3].
- At present, Germany remains well behind these targets.
- There is now an opportunity to take decisive countermeasures and close this gap through targeted action.

What is needed? Our five key fields of action

The WHO, the EU, and countries such as Australia [4], Scotland [5] und Sweden [6] demonstrate how ambitious national strategies for the elimination of HPV-related diseases, particularly cervical cancer, can be implemented.

Germany now has a historic opportunity to follow this example and establish a National Strategy for the Elimination of HPV-Related Cancers.

Our recommendations are addressed to you as political decision-makers and are structured around five key fields of action. The goal is a holistic prevention strategy that includes both vaccination and effective screening programmes — while consistently incorporating the perspectives and experiences of those affected.

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Position Paper on the Elimination of HPV-Related Cancers in Germany

I. Strategic Governance & Monitoring

- Introduction of an HPV vaccination registry and digital recall systems
- Expansion of the electronic vaccination record within the electronic patient record (ePA) — including retrospective entry of earlier vaccination data and automated vaccination reminders
- Increase HPV vaccination rates in a gender-neutral manner to 75% [7] and participation rates in cervical cancer screening to 80%
- Annual report by the Federal Ministry of Health on progress toward targets and, where necessary, adjustment of measures
- Strengthening the patient perspective through a central contact and information center for people affected by HPV, combining information, support, and advocacy

II. Facilitating Access & Strengthening Invitation Systems

- Target-group-specific, personalized, and low-threshold invitations for all insured persons [8]
- Services such as the Mädchensprechstunde M1, which addresses upcoming developmental tasks in a gender-sensitive manner, provides information on HPV vaccination and screening, and administers vaccinations not yet received, should be expanded nationwide and complemented by a comparable format for boys.
- Enable HPV self-testing for underserved women over the age of 35 who do not participate in cervical cancer screening [9]
- Expand mobile services, workplace-based initiatives, and specialized centers

III. Strengthening Vaccination Programmes

- Integrate HPV and vaccination information into schools in order to strengthen the health literacy of young people
- Enable voluntary school-based HPV vaccination programmes, particularly in disadvantaged regions [10]
- Firmly integrate HPV vaccination into preventive medical examinations (new U10, J1)

IV. Improving Communication & Awareness

- Timely implementation by the BIÖG of a national, gender-neutral, manufacturer-neutral, and evidence-based information campaign on HPV prevention, with a focus on cancer prevention
- Timely adoption of the National HPV Action Plan of the NaLI
- Target-group orientation, multilingualism, and an approachable style of communication
- Involvement of affected individuals as authentic voices

V. Securing Structural & Financial Framework Conditions

- Remuneration for physician-provided preventive services should be structured in a way that adequately reflects both the preventive benefit for insured persons and the effort required for implementation
- Deepen and expand continuing education for all relevant professional groups
- Promote targeted research on the early detection of additional HPV-related cancers — particularly oropharyngeal carcinoma as well as vulvar, vaginal, penile, and anal cancers
- Bring together all HPV-relevant disciplines and networks through a central coordination office

What does prevention cost — and what does it save?

Investments in HPV prevention are highly cost-effective. Studies from Germany and abroad show that every euro invested pays off multiple times over — through savings in treatment costs, preserved life years, economic productivity, and social participation.

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Position Paper on the Elimination of HPV-Related Cancers in Germany

Our Appeal

We urge you, as political decision-makers, to:

- Put HPV elimination on your political agenda now.
- Initiate a cross-sector national strategy.
- Make prevention a central pillar of sustainable healthcare.
- Make history together with us: with a Federal Government HPV strategy that effectively brings together vaccination, screening, and the voices of those affected.

Germany can succeed — if we act together now. Because we can!

I) Strategic Governance & Monitoring

1. Achieve **gender-neutral HPV vaccination rates of 75%** [7] and participation rates in **cervical cancer screening of at least 80%**.
2. Introduce a **national vaccination registry** that not only serves data collection and governance functions, but also enables digital recall processes.
3. Design the **electronic vaccination record within the electronic patient record (ePA)** in such a way that earlier vaccination data can also be recorded and medical practices can send automated reminders for due HPV vaccinations.
4. **Data on HPV vaccination and participation in cervical cancer screening should be published annually** in order to systematically evaluate progress toward the targets of the strategy for the elimination of HPV-related cancers and, where necessary, to adjust measures with the involvement of affected individuals and patient organizations.
5. **To strengthen the perspective of those affected, an overarching advocacy structure should be established** that includes both HPV-positive individuals without disease and patients with HPV-related cancers and precancerous lesions. This structure should consolidate the needs of both groups, contribute their perspectives to political processes, play a central role in informing and educating the public, and support the establishment and coordination of regional self-help groups.

II) Access & Invitation Systems

6. **Introduce a standardized, culturally sensitive, and low-barrier invitation system for cancer screening** that regularly reaches all insured persons (including those with private health insurance) on an individual basis, is linked to cervical cancer screening services, and integrates low-threshold digital solutions for appointment scheduling with response options (apps, QR codes, multilingual information); the G-BA should shorten the invitation intervals for organized cancer screening from five to three years — in line with the recommended screening time points — and abolish the upper age limits.
7. In order to increase participation in HPV vaccination within the framework of the new U10 and J1 check-ups**, the Federal Government should promote measures that enable health insurance funds to invite children in a legally secure and targeted manner**.
8. **Facilitate access to cervical cancer screening through low-threshold services** (mobile and workplace-based initiatives, pop-up practices, evening/weekend consultation hours, consultations with occupational physicians, specialized prevention centers); involve affected individuals and patient organizations as partners in awareness-raising, motivation, and quality feedback.
9. **HPV self-tests should only be offered to underserved women aged 35 and over who have not participated in screening within the past five to ten years**. This requires clear informational materials and defined follow-up pathways that directly refer those who test positive to a gynecologist. This offer is not suitable for women under 35, because HPV infections are common in this age group and usually resolve spontaneously — thereby avoiding unnecessary distress and follow-up examinations.

III) Strengthening Vaccination Programmes

10. **Enable voluntary school-based HPV vaccination programmes and promote the development of health literacy for HPV prevention** — for example through model regions or targeted programmes in vulnerable municipalities — with implementation by the Public Health Service (ÖGD) and secured financing under Section 132e of Book V of the German Social Code (SGB V). Legal certainty regarding the consent of persons with parental responsibility must be ensured.
11. Use the **new U10 preventive check-up** for children aged 9–10 as well as the J1 examination as opportunities to offer counselling on and administration of the HPV vaccination, including information that cervical cancer screening remains relevant later in life despite vaccination, since HPV vaccines do not cover all cancer-causing HPV types.

IV) Communication & Awareness

12. **Communicate HPV vaccination in a gender-neutral way** and establish it as a central cancer prevention measure for all genders — with the involvement of affected individuals and patient organizations.
13. **Invest in a national, evidence-based, and manufacturer-neutral public information campaign by the BIÖG** that is emotionally engaging and tailored to target groups, scientifically sound, disseminated through diverse channels (social media, posters, television), designed in multiple languages, and includes authentic multipliers and affected individuals, while clearly conveying the importance of HPV vaccination and screening and referring people to reliable sources of further support such as the Cancer Information Service (KID) or ZERVITA.

V) Structural and Financial Framework Conditions

14. **Appropriate remuneration for preventive medical services** — such as vaccinations, vaccination status checks, and screening examinations — supports quality-assured implementation and strengthens motivation for prevention. In this context, conversational medicine should be structurally strengthened as a central component of medical preventive care.
15. **Systematically disseminate, expand, and embed continuing education and training opportunities on HPV cancer prevention (vaccination and screening) within the relevant structures** — through the targeted visibility of existing offers as well as the development of new formats for physicians from all relevant specialties, medical students, staff at public health offices, teachers, and occupational physicians.
16. The Federal Government should call on the responsible authorities to **extend the approved indications of the available HPV vaccines to additional HPV-associated diseases**.
17. **Specifically promote research into the development and validation of early detection diagnostics for additional HPV-related cancers**, in particular cancers of the oropharynx and vulvar, vaginal, penile, and anal carcinomas — in order to enable evidence-based screening strategies beyond cervical cancer in the long term.
18. **Network all relevant medical disciplines (including gynecology, pediatrics, general practice, otorhinolaryngology, oral and maxillofacial surgery, dentistry, dermatology, urology, and proctology**) as well as national and regional networks (NaLI, regional vaccination working groups, cancer aid associations, cancer societies, patient organizations, ZERVITA) and bring them together through a holistic coordination office at the Federal Ministry of Health.

1. INTRODUCTION

The elimination of HPV-related cancers is not a vision for the future, but a realistic public health policy goal. In 2020, the World Health Organization (WHO) presented a clear roadmap for the elimination of HPV-related cancers [11], to which numerous countries have already committed themselves, including Germany. However, Germany has so far lagged behind internationally in implementation. Yet our healthcare system has the necessary prerequisites to significantly reduce the burden of disease through a targeted combination of HPV vaccination and organized cervical cancer screening.

HPV-related cancers, such as cervical cancer, are distinctive in that they can be traced back to a clearly identifiable and preventable cause: persistent infection with so-called high-risk HPV types [12, 13]. Unlike many other cancers, HPV vaccination provides a highly effective instrument of primary prevention [14]. Secondary prevention is also very well supported by scientific evidence through the early detection of cervical abnormalities: screening procedures make it possible to reliably identify precancerous lesions and treat them in time — and are therefore regarded as an effective instrument for significantly reducing the development of cervical cancer [15]. Despite these favourable conditions, the available data show that both pillars of prevention in Germany are not as effective as they could and should be, because they are not being systematically integrated and implemented. With this paper and the specific recommendations it contains, we aim to change this and advocate for a holistic elimination strategy (incidence < 4 / 100,000) for HPV-related cancers.

In addition to the positive effects on individual health and the overall benefit to society, the macroeconomic advantage of consistent prevention and early detection is also evident: the implementation of a national strategy for the elimination of HPV-related cancers could not only prevent disease and suffering, but also save considerable healthcare costs and strengthen long-term economic productivity.

A recent health economic model shows that around 3,000 people in Germany die from HPV-related cancers each year [2]. In 2022 alone, this resulted in an estimated loss of more than 47,000 life years and almost 14,000 working years. According to these calculations, the economic damage amounts to around **311 million euros annually**, meaning that Germany bears by far the greatest burden in Europe. Women are particularly affected by cervical cancer, but men are also affected by HPV-related head and neck, anal, and penile cancers. These losses are preventable. A holistic and consistent vaccination and screening strategy would not only save thousands of lives each year, but would also prevent hundreds of millions of euros in productivity losses — a clear health and economic gain.

A further health economic model based on a dynamic transmission model shows that HPV vaccination of, for example, 12-year-old girls in addition to the existing cytology-based screening programme not only substantially reduces the burden of cervical cancer, but in many scenarios also demonstrates a very favourable cost-benefit ratio. Over a period of 100 years, with a vaccination coverage of 50%, around 100,000 cases of cervical cancer and approximately 24,000 deaths could be prevented — corresponding

to a 37% reduction in incidence and a 30% reduction in mortality. These figures apply to a scenario without vaccination of boys, using the previous quadrivalent vaccine, a three-dose schedule, and a vaccination coverage of 50% among girls. With the current nonavalent vaccine and a two-dose schedule, the outcomes would be even better. Overall, this would save around **one billion euros** in direct and indirect costs compared with screening alone [16]. These findings underline that investments in HPV vaccination — in combination with effective screening — are of major medical, social, and economic value.

At the same time, prevention is not only about macroeconomic effects, but first and foremost about the people who benefit from it. For individuals, effective HPV prevention means the opportunity for a healthy life — free from the burden and fear of a life-threatening HPV-related disease. High vaccination coverage and consistent participation in, for example, cervical cancer screening make it possible to prevent infections or detect them early and treat them in a targeted way, long before cancer develops. This not only helps avoid major medical interventions and burdensome therapies, but also preserves quality of life, autonomy, and social participation. Prevention therefore not only prevents disease, but also the suffering that it brings to affected individuals and their families. In addition, it helps protect women's reproductive health, as both HPV infections and surgical treatment of cervical precancerous lesions (e.g. conization) are associated with an increased risk of preterm birth and obstetric complications [17, 18, 19]. This is precisely why it is essential to actively involve affected individuals and patient organizations in the development and implementation of a national strategy for the elimination of HPV-related cancers: they give affected individuals a voice, make personal experiences visible, and help ensure that strategies are practical, widely accepted, and effective.

While other countries, such as Sweden [20], Canada [21] or Ireland [22] are moving ahead with ambitious plans and strategies for the elimination of HPV and with binding political strategies, Germany still lacks a nationally coordinated and strategically aligned overall approach. Existing programmes run in parallel, important target groups are not being reached, and structural barriers remain in place. At the same time, public and political attention to prevention as a whole remains underdeveloped — in stark contrast to its cost-saving potential and its possible contribution to improving health.

This position paper is addressed to political decision-makers as well as to all actors involved in health policy self-governance. It shows which potentials remain untapped, which structural and communication barriers must be overcome, and what political action is now required to sustainably reduce and ultimately eliminate HPV-related cancers in Germany.

2. CURRENT SITUATION

Human papillomaviruses (HPV) are the main cause of a range of cancers. In Germany, around 4,400 cases of cervical cancer occur each year, and approximately 1,400 women die from it [23]. In addition, there are several thousand cases of other HPV-associated carcinomas — including anal, penile, vaginal, and vulvar carcinomas, as well as, in particular, HPV-related head and neck tumors (e.g. in the oropharynx), which are also increasingly affecting men [24]. Overall, it is estimated that around 10,000 new cancer cases in Germany each year are caused by HPV [25]. HPV is transmitted predominantly through direct skin-to-skin or mucosal contact, especially during genital, anal, or oral sex [26].

Despite this high burden of disease, vaccination and screening programmes in Germany have so far operated largely independently of one another. Vaccination campaigns and early detection initiatives are planned, managed, and communicated separately, without systematically making use of synergies or creating shared points of contact with target groups. As a result, valuable opportunities are being missed — for example, to provide information about screening at the same time as offering vaccination, or conversely, to point out the importance of HPV vaccination during screening. Closer integration of these two pillars of prevention could significantly increase their reach and effectiveness and make optimal use of contact opportunities with the affected populations.

2.1. HPV Vaccination

The good news is that HPV-related cancers are preventable. In Germany, two inactivated vaccines — Cervarix® (bivalent) and Gardasil®9 (nonavalent) — are approved and available for protection against HPV[27]. Depending on the vaccine, HPV vaccination protects against two or seven high-risk HPV types that are responsible for the majority (approximately 70–92%) of the cancers mentioned above [28]. The Standing Committee on Vaccination (STIKO) has recommended HPV vaccination for girls since 2007 and for boys since 2018. Nevertheless, vaccination coverage in Germany remains well below the targets set by the WHO and the European Commission. In 2023, only 54.6% of 15-year-old girls and 34% of 15-year-old boys nationwide were fully vaccinated [29].

Other countries demonstrate the potential of high vaccination coverage: In Australia, the incidence of cervical cancer among young women has declined dramatically since the introduction of the national HPV vaccination programme. For example, the prevalence of vaccine-covered HPV types among women aged 18–24 fell from 22.7% (2005 – 2007) and 7.3% (2010 – 2012) to just 1.5% in 2015. In the 25–35 age group, it also declined from 11.8% to 1.1% over the same period [30].

In Germany, early data also show a slight decline in precancerous cervical lesions — despite low vaccination and screening rates [31]. This underlines the as yet untapped potential of vaccination [32] as

well as of early detection. Despite individual initiatives, HPV vaccination rates in Germany have not increased further in recent years. Germany is therefore not only failing to meet the WHO target of 90% vaccination coverage among girls under the age of 15 [33], but also lags far behind countries such as Ireland, Denmark, and the United Kingdom, which achieve vaccination rates of over 80% [34, 35].

Unlike many other European countries, Germany does not have a structured HPV vaccination programme with active invitation. Instead, the country relies on an opportunistic approach. This means that adolescents or their parents must take the initiative themselves and ask their physician about the vaccination. In countries with structured programmes, the system works differently [36]. There, all adolescents in the target group systematically receive a vaccination offer — for example through schools or by invitation letter. This approach has been shown to lead to higher vaccination rates [37]. In Germany, by contrast, many adolescents are simply never reached with the offer or vaccination is postponed. In Germany, the insufficient uptake of the adolescent health check-up (J1) and the long-overdue introduction of a U10 examination may further exacerbate the situation. As a result, HPV prevention in Germany is not reaching its full potential.

2.2. Screening

The picture is similarly ambivalent in secondary prevention: since 2020, Germany has had an “organized” cancer screening programme (*organisierte Krebsfrüherkennung*, oKFE) for cervical cancer, available to all women aged 20 and over. Depending on their age, women are offered different screening tests (Pap test or Pap test + HPV test) [38]. Only women with statutory health insurance also receive a letter every five years with further information about the programme and the benefits and risks of the examinations offered, whereas women with private health insurance do not receive this information and are therefore less well informed about the relevance of cervical cancer screening. In order to assess the effectiveness, quality, and safety of the screening programme, an evaluation report is prepared every two years [39]. Despite these elements, participation in cervical cancer screening is currently insufficient. In 2021, participation among statutorily insured individuals aged 20 to 35 in cytology-based screening was only around 45% [40]. In addition, participation is significantly lower in certain risk groups. Socioeconomically disadvantaged groups, migrants, and women with a low level of education are particularly underserved.

A further problem lies in the limited reach of the invitation and information systems. Unlike in countries such as the Netherlands [41, 42] or Finland [43], Germany does not send personalized invitations with a specific appointment proposal and accompanying materials. The existing information letter from the health insurance funds provides a good basis, but it could be made even more effective if the timing and frequency of mailing were aligned more closely with the actual screening intervals — annually for women aged 20 to 34 (Pap test) and every three years from the age of 35 onward (co-test).

Since invitation letters have been shown to increase participation rate [44], the G-BA should, within the framework of organized cancer screening, enable the health insurance funds to use these instruments in a more targeted way. At present, women aged 65 and over are no longer invited, even though they still account for around 25% of those affected [45]. Extending invitation letters to this age group could further increase the reach of the programme and make an effective contribution to prevention.

HPV self-tests ("self-sampling") are not yet part of the organized cervical cancer screening programme (oKFE) in Germany. However, international studies show that, particularly among women over the age of 35[1] who have so far not participated or have participated only irregularly in screening, they have the potential to significantly increase participation rates [49, 50]. In order for this instrument to be used effectively and safely, clear framework conditions should be established: target-group-specific information to support informed decision-making, regulated procedures for medical follow-up in the case of positive results, binding quality standards, and supplementary counselling services, for example via telephone hotlines or digital platforms.

At the same time, it is important to note that HPV self-tests must not replace physician-based screening, as their diagnostic quality is currently inferior to that of clinician-collected samples[51, 52]. They should therefore be used exclusively as a complementary option for underserved women aged 35 and over.

In Germany, cervical cancer screening is embedded in comprehensive gynecological preventive care. A self-sampling offer for the specific target group of older, underserved women should support rather than weaken this structure — and should be targeted specifically to where evidence-based findings demonstrate an additional benefit for prevention.

At the same time, remuneration for preventive services is often not attractive enough, meaning that counselling and educational discussions in medical practice tend to be too brief. This also contributes to the fact that screening often does not occupy a central place in routine care.

In summary, Germany is not making systematic use of its existing resources in HPV prevention, even though the knowledge, the instruments, and the technical prerequisites have long been available.

[1] In women under 30 years of age, high-risk HPV infections are very common and usually clinically insignificant, meaning that HPV self-tests in this age group may more frequently lead to false-positive findings, overdiagnosis, and unnecessary interventions associated with physical and psychological burdens[46] [47] [48].

3. EXISTING BARRIERS: WHY IMPROVEMENTS FAIL TO MATERIALIZE

Despite medical progress and a large body of available scientific evidence, substantial improvements in the prevention of HPV-related cancers in Germany have so far failed to materialize. The reasons are manifold and concern political, structural, and cultural levels alike.

Lack of an Overall Strategy and Political Prioritization

Unlike countries such as Australia, Canada, Sweden, or Ireland, Germany has so far not adopted a binding national elimination strategy. Although a "National Concept for the Promotion of Vaccine Awareness and HPV Vaccination Rates" ("HPV Action Plan") was announced for 2024, its publication, including concrete targets and cross-sectoral anchoring, is still pending.

In everyday health policy, prevention has so far not received the attention warranted by its long-term potential — even though targeted investments in prevention and early detection offer major opportunities for effective and sustainable structural reform. At present, however, only around 3% of statutory health insurance (GKV) expenditure is allocated to prevention and health promotion overall, while individual areas such as screening measures (approx. 0.9%) and protective vaccinations (approx. 1.0%) each account for only a very small share. This highlights the considerable need for action in order to anchor prevention more firmly as a central pillar of the healthcare system [53].

Organizational Fragmentation

HPV prevention in Germany is distributed across multiple stakeholders: the federal government, the federal states, health insurance funds, and medical professional groups each assume partial responsibility. The National Vaccination Steering Committee (NaLI) already coordinates various partners within the federal system and serves as an important platform for cross-sectoral collaboration, coordination of implementation, and evaluation and further development of the National Vaccination Plan [54]. In the future, its role could also be expanded to adjacent areas of prevention — such as the cervical cancer screening programme — in order to achieve a holistic perspective on HPV elimination. A shared data foundation could help capture regional differences and address them in a targeted manner. At present, Germany has no central vaccination registry, and the organized screening programme introduced in 2020 is also implemented in a decentralized manner via the health insurance funds [38]. An expansion of existing coordination structures — for example through an integrated vaccination and screening registry — could strengthen HPV prevention in the long term and make the care landscape more transparent.

Legal Uncertainty

A key obstacle is the lack of clarity in data protection law: many health insurance funds hesitate to approach non-participants in a targeted manner because the permissibility under data protection law is perceived as unclear. As a result, contact with those who would benefit most from prevention — including the children of women who are insufficiently screened and who could be invited for vaccination — systematically fails to occur.

Communication Deficits and Lack of Narratives

There is a lack of target-group-specific and culturally sensitive communication. Information materials are often technical, not validated, and fail to appeal either to adolescents or to groups with lower levels of education. Terms such as “prevention” or “screening” are linguistically and conceptually too vague or even off-putting. A memorable narrative is missing — as is a central communication channel.

Whereas in other countries market research is conducted specifically to understand barriers and obtain direct feedback from people who have not yet been reached, in Germany decisions are often made over their heads. Successful prevention work, however, requires listening to these groups, taking their perspectives seriously, and developing communication strategies on that basis. This also includes involving patient representatives more closely or — where they do not yet exist — establishing new patient organizations that can effectively represent the interests of underserved groups. Only in this way can messages be developed that truly resonate and motivate actual participation.

Insufficient Support for Healthcare Professionals

Physicians — especially gynecologists and pediatricians/adolescent medicine specialists — are key multipliers for HPV prevention. However, they are so far not sufficiently supported, either structurally or financially, in fulfilling this role. Training, continuing education, and information materials are also not yet available nationwide in a systematic manner. This has been criticized by numerous experts not only from academia, but also from clinical practice.

Inadequate Services for Disadvantaged Groups

Preventive services primarily reach well-educated groups with strong engagement in health matters. For underserved groups — such as people with a migration background, single parents, people with disabilities, or residents of structurally weak regions — specific concepts are lacking. So far, there has been a lack of regulatory clarity, political will, and the necessary funding to achieve sustainable improvement in this area.

4. RECOMMENDATIONS

The challenges described above and the insufficient implementation of existing opportunities to date must not result in Germany failing to fulfil its responsibility in HPV prevention. The good news is that the tools for an effective and equitable prevention strategy have long been available. What is lacking is not knowledge or technical solutions, but their political and structural implementation.

A look at other countries shows that ambitious programmes can have an impact — provided they are strategically designed, politically supported, and consistently implemented. Germany, too, already has a wide range of proposals and experience available, whether from pilot projects, model initiatives, or civil society organizations. These must now be brought together, further developed, and bindingly integrated into the political framework for action.

ZERVITA, the ACCESS Consensus Group, and the authors of this position paper strongly recommend developing a holistic and nationally coordinated strategy for the elimination of HPV-related cancers that contributes both to significantly increasing HPV vaccination rates and to making cervical cancer screening more accessible.

Models show that the elimination of HPV-related cancers such as cervical cancer can be achieved more quickly if we adopt a holistic perspective and link both aspects together [55], while taking into account the perspective of those affected.

Pillar 1: Significantly Increase HPV Vaccination Rates

A significant increase in HPV vaccination rates for all genders is a key prerequisite for eliminating HPV-related cancers in Germany. This requires a national, strategically governed approach, backed by clear responsibilities, binding target rates, and systematic monitoring.

National Governance & Monitoring

- Adoption of a binding HPV vaccination strategy with a gender-neutral HPV target rate of 75%, clear responsibilities, and annual reporting on progress toward the targets of the strategy for the elimination of HPV-related cancers. Regular joint analysis of the data with affected individuals and patient organizations to ensure practical relevance, transparency, and acceptance.

Digital Infrastructure & Recall Systems

- Establishment of a nationwide digital vaccination registry enabling documentation, governance, and automated recall functions.

- Enable a functional electronic vaccination record within the electronic patient record (ePA) that also includes earlier vaccination data and allows automated reminders for due HPV vaccinations [56].

Integration into Preventive Care & Medical Care

- Systematic integration of HPV vaccination into existing preventive examinations, in particular the new U10 (9–10 years; currently U11) and the adolescent health check-up J1, and in the future also M1 as an opportunity for counselling and vaccination offers. Binding invitation systems are needed to ensure systematic participation in the preventive examinations U10 (currently U11) and J1, as well as active promotion of these examinations by the health insurance funds.
- Physicians of all relevant specialties, medical students, staff in public health offices, teachers, and occupational physicians should be involved through targeted continuing education and training opportunities; financing of HPV vaccination and the associated counselling services should be strengthened through appropriate and structured remuneration in order to ensure nationwide implementation.

Communication & Awareness

- Design and implementation of a national, evidence-based, manufacturer-neutral, and target-group-specific awareness campaign, delivered in multiple languages and through a wide range of channels (social media, TV, posters). In particular, not only boys and girls should be informed about HPV vaccination, but also adult men and women for whom HPV vaccination may be beneficial. Authentic multipliers such as affected individuals, influencers, or athletes should be specifically involved.
- Expansion of binding school-based health literacy programmes from grade 4 onward, with trained teachers and prevention experts, in order to inform pupils and their parents or guardians about HPV and prevention at an early stage.

Regional Pilot Projects & Municipal Initiatives

- In order to increase vaccination rates, pilot projects for voluntary school-based HPV vaccination programmes should be promoted so that successful approaches can subsequently be transferred into routine care nationwide (adopting best practices). The Public Health Service (ÖGD) should support the voluntary implementation of vaccinations in schools. The necessary secured financing under Section § 132e of Book V of the German Social Code (SGB V) must be provided in order to equip the ÖGD organizationally and in terms of personnel.
- Complementary low-threshold services such as mobile vaccination campaigns, for example vaccination buses operated by the ÖGD, and workplace vaccination programmes, in order to reduce access barriers.

Pillar 2: Make Cervical Cancer Screening More Accessible

An effective screening programme is the second key pillar of a holistic elimination strategy for HPV-related cancers. In order to fully realize the opportunities of early detection, binding structures are needed that both facilitate access and increase acceptance and motivation to participate.

National Governance & Monitoring

- Introduction of a binding strategy to increase participation in existing cervical cancer screening, with a clearly defined target rate of at least 80%, clear responsibilities, and annual reporting. Regular joint analysis of the data with affected individuals and patient organizations to ensure practical relevance, transparency, and acceptance.

Binding Improvements to Invitation Systems

- The current information letter should be replaced by a personalized invitation letter and made available in plain language and in multiple languages. In addition, QR codes or other digital tools enabling direct appointment booking should be linked to it. The mailing interval should be shortened from the current five years to one to three years in order to increase willingness to participate. Such a system should be culturally sensitive and ideally designed together with patient organizations, and should include visual elements in order to reach people with low health literacy and limited language proficiency. All women, regardless of whether they have private or statutory health insurance, should be included in the invitation system.

Adapt Structural and Financial Framework Conditions

- Medical counselling services should be appropriately remunerated and incentives created for the active invitation of patients. Physicians should be enabled to provide counselling and motivation for screening participation in an appropriate time frame without having to fear financial disadvantages.

Communication & Awareness

- Design and implementation of a national, evidence-based, and manufacturer-neutral awareness campaign that clearly communicates the importance of cervical cancer screening, especially for HPV-positive people. Communication should be multilingual and reach people through a wide range of channels (social media, TV, posters). Authentic multipliers such as affected individuals and influencers should be specifically involved in order to strengthen trust and acceptance. People who test HPV-positive should receive an information package with the most important explanatory information immediately after the positive test.

Specifically Address Non-Participants

- Data protection law adaptations and implementation measures should be examined in order to make the targeted approach to non-participants ("non-attenders") legally secure. Health insurance funds should be encouraged to invite these groups specifically and remind them to participate. Invitation rights must also be legally anchored for privately insured persons in order to guarantee equal prevention for all insured individuals.

Expand Low-Threshold Care Services

- In order to reach as many eligible persons as possible, complementary and flexible offers are required, such as mobile screening units, pop-up practices, evening and weekend consultation hours, consultations with occupational physicians, or specialized prevention centers. These forms of care reduce barriers and enable participation particularly for working people, people with limited mobility, or socially disadvantaged groups. Affected individuals and patient organizations should be systematically involved here as multipliers in awareness-raising, as partners in reaching difficult-to-reach groups, and as an important source of feedback on the quality and practicality of the services. Their perspective helps ensure that measures are designed according to needs and implemented effectively in the long term.

Create Additional Screening Options for Underserved Women

- HPV self-tests ("self-sampling") should be specifically offered to women aged 35 and older who have not participated in cervical cancer screening within the last five to ten years, since this group has a significantly increased risk of developing invasive cervical cancer [57]. Preconditions are clear and understandable information materials, defined follow-up pathways with direct referral of positively tested women to a gynecological practice, quality-assured testing procedures, and supportive counselling services, for example via a hotline. It is crucial that self-sampling complements gynecological preventive care rather than replaces it. This option should not be provided for people under the age of 35, because HPV infections are common in this age group and usually resolve spontaneously, and unnecessary follow-up examinations and burdens must be avoided. See also the current statement by the guideline group on cervical cancer prevention [58].

Cross-Cutting Recommendations

Promote Research on the Early Detection of Other HPV-Related Cancers

- Research into the development and validation of new early detection diagnostics for additional HPV-related cancers, particularly in the oropharynx and in vulvar, vaginal, penile, and anal carcinomas, should be specifically promoted. In this way, the evidence base can be established in the long term to enable screening strategies beyond cervical cancer. At the same time, evaluation

projects should be conducted to regularly assess the effectiveness and acceptance of existing and new screening formats.

Actively Involve Affected Individuals and Patient Organizations

- For HPV vaccination and screening to succeed, affected individuals and patient organizations should be systematically involved in awareness-raising efforts and in the development of further measures. Their experience helps identify barriers, reduce fears, and shape culturally sensitive, practical information services that are relevant to everyday life. As credible multipliers, they can reach groups that are particularly difficult to engage and thereby sustainably increase participation in vaccination and screening.

Ensure Interdisciplinary Networking

- All relevant disciplines — including gynecology, pediatrics, general practice, ENT, oral and maxillofacial surgery, dentistry, dermatology, urology, and proctology — should be systematically involved. National and regional networks such as NaLI, regional vaccination working groups, cancer support and self-help associations, cancer societies, and patient organizations should be brought together through a central coordination office. This will make it possible to exchange best practices, involve affected individuals, and continuously improve the quality of prevention.

4. WHAT MAKES OUR ROADMAP FOR THE ELIMINATION OF HPV-RELATED CANCERS DISTINCTIVE

Our proposal goes beyond previous separate and non-specific recommendations, which have mostly focused only on individual elements: we combine HPV vaccination and cervical cancer screening into a holistic strategy that links these two pillars and is based on clear scientific evidence while also being practical to implement. We ensure that affected individuals and patient organizations are actively involved — not merely as a symbol, but as genuine partners in awareness-raising and quality development. And we show that the elimination of HPV not only saves lives, but also makes economic sense: every investment in prevention saves substantial costs in the long term and strengthens health equity.

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