Context

Data shows that most children and adolescents living in lower-middle-income countries are exposed to air pollution above the World Health Organization recommended levels. Exposure to air pollution can lead to life-altering and life-threatening chronic respiratory diseases and other health issues. Higher pollution levels have also been linked to lower academic performance due to sickness, missed school, and an increased risk of dropout.

UNICEF has sought to address the adverse effects of air pollution on adolescents by reducing their exposure, reducing the amount of air and climate pollutants, and improving air quality. As part of this process, UNICEF Vietnam has actively engaged adolescents, including in awareness-raising, data collection, and advocacy.

Programme Approach

In Vietnam, air pollution is largely caused by transportation, construction, burning of crop leftover, and coal power plants. To address this problem, the Government is developing the first action plan for addressing air pollution in schools through the Ministry of Education and Training (MOET).

The plan includes air purification recommendations, air quality guidelines for when to wear a mask, safe air quality levels for participating in physical education classes, and standards for managing air conditioning at schools. UNICEF supports this important work by facilitating nationwide consultations with students and student councils to discuss, address, and develop recommendations. Through this work, the recommendations from adolescents as well as guidance on facilitating student-led initiatives to address air pollution are now included in the action plan.

One of the adolescent consultations towards developing the school action plan happened in collaboration with the NGO Clean Air Asia and the Saigon Innovation Hub (SIHUB), which led to the establishment of the 'New Solutions to Air Pollution' innovation initiative. This initiative engaged adolescents, youth, teachers, and club leaders from six innovation hubs at universities and secondary and high schools in Ho Chi Minh City; 110 adolescents from the six
innovation hubs first learned about the adverse effects of air pollution at community and school levels. They then shared their learnings with an estimated 4,500 peers and community members through various awareness-raising activities and channels, including social media. In addition, the six innovation hub teams received hands-on training, coaching, and mentorship to create, test, and pilot ideas for solutions to air pollution. The teams pitched these at a Clean Air Day event that was attended by more than 100 participants, including representatives from UNICEF, academia, educational institutes, the private sector, and government agencies, as well as children and adolescents.

Solutions and prototypes included developing a filter to clean the smoke discharged from chimneys at restaurants and street vendors around schools; promoting the installation of air quality monitoring devices in and around schools; and advocating for clean energy public transportation and traffic behavior change (i.e., using bicycles or walking instead of scooters and cars), and air quality warning systems.

Pitches were in some cases successful in mobilizing support from partners. This was the case for the air quality monitoring sensors which, with support from SIHUB, the United States Consulate, the RMIT University Vietnam, and Clean Air Asia, were installed in 13 schools. Students were part of the decision-making on where to locate the sensors, and the resulting data has been used in the schools to engage students in air pollution management.

The ‘New Solutions to Air Pollution’ innovation initiative also led to UNICEF partnerships with the Institute of Environment and Resources of the Vietnam National University, which is now providing expertise to help children and adolescents understand the issues of air quality and pollution and develop local solutions for it.

Lessons Learned

Promote adolescents as legitimate stakeholders and partners. Historically in Vietnam, adolescent participation in public policy has been minimal. The involvement of adolescents in the school action plan decision-making and the Ho Chi Minh City innovation hubs aimed to change this. They did so by highlighting and providing evidence on the value of their contributions and ability to advocate for change.

Integrate short- and long-term action. One-time events such as the Clean Air Day can have an impact if paired with opportunities and resources for adolescents to participate in longer-term formal processes (after the event). For example, UNICEF is advocating for the action plan for addressing air pollution in schools to include student-led climate action initiative as one of the key indicators for climate-responsive schools.

Support teacher and parent training. Since air pollution has been a daily part of people’s lives for so long, many adults are unaware of its impacts on adolescents – or solutions they can contribute to improve air quality. Investing in parent and teacher training, including training led by adolescents, can help improve the intergenerational understanding of what measures to take to reduce exposure to air pollution and improve air quality. To this end, the Vice Minister of Education and Training and UNICEF Vietnam recently launched a UN-accredited teacher training (UN CC Learn) – technically supported by UNICEF and adapted for the Vietnam context – that highlights how children and youth are impacted by climate change and air pollution, how their resilience can be strengthened, and how they can address this challenge. After this course, teachers were equipped to strengthen students’ climate change skills (e.g. green habits) and facilitate student-led activities to mitigate impacts of climate change and air pollution.

Acknowledgements and Contacts

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Endnotes

2. [https://www.who.int/health-topics/air-pollution#tab=tab_2](https://www.who.int/health-topics/air-pollution#tab=tab_2)
3. [https://apps.who.int/iris/bitstream/handle/10665/69477/WHO_SDE_PHE_OEH_06.02_eng.pdf;jsessionid=218F](https://apps.who.int/iris/bitstream/handle/10665/69477/WHO_SDE_PHE_OEH_06.02_eng.pdf;jsessionid=218F)