

Effects of Lockdown on Health

New research from RCSI University of Medicine and Health Sciences and Children's Health Ireland (CHI) shows babies born during the earliest lockdown in 2020 had a very low rate of antibiotic use and reduced hospital admissions.

The research found that the babies had very low rates of Covid-19 infection by six months of age, suggesting lockdown was an effective public health strategy in protecting one of society's most vulnerable groups.

The CORAL study is collecting blood and stool samples from 360 babies to investigate the impact of Covid-19 lockdown on their coronavirus exposure and routine healthcare access in Ireland.

Principal investigator, Professor Jonathan Hourihane from CHI at Temple Street and RCSI's Department of Paediatrics, said, "We set up the study to see if lockdown might support the so-called hygiene hypothesis – suggesting that the way we live so cleanly nowadays increases allergy rates. Initial results of the study show very low rates of antibiotic use and reduced hospital admissions for our participants. We also saw higher than average rates of immunisation in babies when it was thought uptake would actually decline, due to fears about going to healthcare facilities."

In total, only four participating children contracted Covid-19 during the first six months – two who had positive tests in the community and two other babies having unexpectedly positive Covid-19 results when attending their appointments in CHI at Connolly.

Professor Hourihane added: "We will continue to study the stool microbiome and allergy rate results but the indication of low Covid infection rates, low antibiotic use and low hospital attendance suggest we are on the right track with fewer infections circulating. It is reassuring that this population of infants born during lockdown have received routine healthcare as normal."

Expand Role of Pharmacy in Health Threats

Pharmacists must be allowed to do more to manage respiratory conditions in communities if the urgent need to address the harmful effects of air pollution on health is to be met, the International Pharmaceutical Federation (FIP) has said.

Catherine Duggan, FIP CEO

The expansion of pharmacists' roles in mitigating the health threats of air pollution is among several actions described in a call to action issued by FIP, marking the United Nations International Day of Clean Air for Blue Skies.

The call to action is based on priorities identified by a round table of experts organised by FIP in collaboration with The Clean Breathing Institute (TCBI) earlier this year. "Air pollution is one of the top 10 threats to global health, according to the World Health Organization, with harmful effects manifesting in cancer, stroke, allergies, chronic obstructive pulmonary disease (COPD) and asthma, among other serious conditions.

FIP believes that pharmacists, at the hearts of communities and uniquely positioned to triage and manage people with respiratory symptoms and diseases, have the potential to make a huge impact on health outcomes," said FIP CEO Catherine Duggan.

The FIP call to action recommends pharmacy services that identify and reduce risk factors, such as smoking cessation, education on nasal hygiene and optimisation of inhaler technique for patients with COPD or asthma, as well as services that screen for vaccine hesitancy and social vulnerability. However, the federation recognises that policies are needed in order to increase public awareness of air pollution and pharmacists' related roles, and to scale up pharmacy education in this field. Detailed measures are described in the call to action.

Recent findings of a survey by FIP and TCBI support a need for an expanded role for pharmacists in air pollution and respiratory health, and FIP has called for incentives to encourage these services to become mainstream practice.

"In this call to action, FIP has made clear its commitment to advocating air pollution reduction as a health measure and to supporting pharmacists and their national organisations to provide better respiratory primary healthcare services. Our profession must be



mobilised to act on this important issue," Dr Duggan said.

September 6th-10th recently marked Clean Air Week, and FIP invited individual pharmacists to pledge their commitment to the key actions described in the FIP call to action.

Meanwhile, the Irish Heart Foundation has said strict new measures on the burning of solid fuels in homes will reduce the number of lives lost to dirty air.

The charity welcomed Department of the Environment, Climate and Communications regulations - which include a national ban on smoky fuels in 2022 - as a "huge step" in reducing the impact of toxic air pollution.

"Air pollution is responsible for over 1,300 deaths every year in Ireland, with the vast majority of these due to heart disease and stroke," said Mark Murphy, Advocacy Officer with the Irish Heart Foundation.

"These measures will have a significant impact on this largely preventable loss of life as well as improving overall levels of public health.

"There is simply no safe level of exposure to air pollution, and while these updated domestic solid fuel regulations still permit the burning

of some solid fuel with stricter standards, they are a huge step in the right direction and will reduce the number of lives lost to dirty air."

Although the new measures will effectively ban and curtail the burning of smoky coal, wet wood and sod peat, the national heart and stroke charity said thousands of fuel-poverty households in Ireland still hugely reliant on these fuels, can not be left behind.

In its 2022 pre-budget submission, it calls for the introduction of a Green Transition Fuel Allowance to support and facilitate those most vulnerable in moving away from the worst affecting solid fuels to more sustainable and healthier forms of heating.



Mark Murphy,
Irish Heart Foundation