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## P209. POLLENS, PLANTS, POLLUTANTS & ALLERGIES

Aysel Kekilliođlu, Ebru Kunduracı, H.Kübra Kekilliođlu

Nevşehir Hacı Bektaş Veli University, Faculty of Arts and Sciences, Department of Biology, 50300, Nevşehir, Turkey

Gazi University, Faculty of Engineering and Architecture, Ankara Turkey

Pollen has an important place among aeroallergens in terms of their role in allergic diseases. Pollen allergy has a remarkable clinical impact all over world. The pollen from the plants that cause allergic diseases depends on the flora and climatic conditions of the region. Grass pollen is the major cause of pollinosis in many parts of the world. Because of its climatic conditions, characterized by mild winters and sunny days with dry summers, Turkey has variable different phytogeographical regions differing in climates as well as vegetation cover. Therefore, the density and diversity of pollen in the atmosphere show regional differences. The country possesses an enormous floristic wealth. Approximately over 10.000 plant taxa show distribution in the country which is very close to the number of taxa distributed in the whole of European continent. The potential allergenic effects of atmospheric

pollens on human health have been divided into different categories as taxa with highest, medium, lowest allergenic effects. The pollen allergy incidence shows variation all over the world, depending on the countries and different climates. The most important factor in pollen allergy, is the composition of the pollen in the air. The pollens from different plants show different allergic degrees in humans. Pollen allergy symptoms show a good correlation with atmospheric pollen counts. Therefore, an identification of the pollens from different plant taxa causing allergic reactions proves of great help in this connection. A qualitative and quantitative analysis of the atmospheric pollen with environmental factors, is important for the characterization of both pollens and pollen allergies. Recent studies have demonstrated that urbanization, high levels of vehicle emissions and westernised lifestyle are correlated with the increasing frequency of pollen-induced respiratory allergy and people who live in urban areas tend to be more affected by pollen-induced respiratory allergy than people living in rural areas.

[akekillioglu@hotmail.com](mailto:akekillioglu@hotmail.com)