Mini Review

Endocrine Disrupting Chemicals

Endocrine disrupting chemicals (EDCs) are chemicals that have the capacity to modulate endocrine systems. They are mostly man-made, found in various materials such as phytocarboxylics, pesticides, consumer products, and plastics [1]. Given the terrible burden of type 2 diabetes mellitus (DM) and macrovascular disease in modern society, understanding the links between environmental pollutants and these disease states is critical for formulating effective prevention strategies and identifying novel therapeutic interventions. Phthalates are a class of industrial chemicals that consist of mono-benzyl phthalate (MBzP) and mono-2-ethylhexyl phthalate (MEHP) widely applied in the increase of flexibility and resilience in consumer products such as plasticizers [2]. MBzP and MEHP, phthalate metabolites, potentially affect traditional cardiovascular risk predictors including carotid intima-media thickness (CIMT) and the echogenicity of intima-media and plaques in the Prospective Investigation of the Vasculature in Uppsala Seniors study [3-4]. As a weak EDC, plenty of animal studies have shown low-dose effects of Bisphenol A (BPA).

Those investigations have addressed complications of BPA on neurologic development, reproductive function and metabolic
Moreover, the potential influence of exposure to EDCs on the major atherosclerosis in primary prevention of environmental cardiology. There is evidence to find the relationship between EDCs and subclinical atherogenic pathogenesis. We discuss the important circumstantial evidence. The MEHP metabolite is the major component of phthalates-induced cardiovascular risks among high exposures, mostly coming from the first phase metabolite MEHP in young population. In the presence of prenatal phthalate exposure, a Spanish birth study in the first phase metabolite MEHP in young population. In the presence of prenatal phthalate exposure, a Spanish birth study demonstrated the cardiovascular risks among high exposures, mostly coming from the first phase metabolite MEHP in young population.

**Conclusion**

EDCs including phthalates, BPA, and PFOS may aggravate subclinical atherosclerosis in adolescents and young adults. MEHP metabolite is the major component of phthalates-induced atherogenic pathway. We discuss the important circumstantial evidence to find the relationship between EDCs and subclinical atherosclerosis in primary prevention of environmental cardiology. Moreover, the potential influence of exposure to EDCs on the major atherosclerotic cardiovascular events warrants more extensive and prospective cohort researches in the future.

**References**
