Vaskularni biomarkeri u kardiovaskularnoj prevenciji

Vascular biomarkers and cardiovascular prevention

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Potreba za boljom stratifikacijom kardiovaskularnog (KV) rizika u primarnoj i sekundarnoj prevenciji potaknula je brojna istraživanja vaskularnih biomarkera. Kritički osvrt perifernih, nekoronarnih, vaskularnih biomarkera u KV prevenciji i njihov potencijal integriranja u kliničku praksu objavila je 2015. godine Radna skupina za perifernu cirkulaciju Europskog kardiološkog društva (ESC). Od sedam evaluiranih vaskularnih biomarkera, najbolje dokaze o potencijalnoj koristi pokazali su karotidni ultrazvuk (debljina intima-medija i karotidni plakovi), pedobrahijalni indeks (ABI od engl. *ankle-brachial index*) i karotidno-femoralna brzina pulsno vala (PWV od engl. *carotid-femoral pulse wave velocity*). Važno je naglasiti da za sada nema dokaza da je jedan vaskularni biomarker superioran naspram ostalih.^{1,2}

U ovom predavanju su prikazana najvažnija istraživanja o navedena tri vaskularna biomarkera, njihova ograničenja i nedostaci te preporuke o korištenju vaskularnih biomarkera prema smjernicama ESC-a za KV prevenciju. Rutinsko mjerenje vaskularnih biomarkera u procjeni KV rizika se ne preporuča. Racionalno korištenje pojedinih vaskularnih biomarkera prvenstveno u osoba s umjerenim KV rizikom može poboljšati prevenciju KV bolesti.

The need for better stratification of cardiovascular (CV) risk in primary and secondary prevention has prompted numerous studies of vascular biomarkers. A critical review of peripheral, non-coronary, vascular biomarkers in CV prevention and their potential integration into clinical practice was published by the European Society of Cardiology (ESC) Working Group on peripheral circulation in 2015. Among seven evaluated vascular biomarkers, the best evidence of the potential benefits showed carotid ultrasound (intima-media thickness and carotid plaques), ankle - brachial index (ABI) and carotid - femoral pulse wave velocity. It is important to emphasize that so far, there is no evidence that one vascular biomarker is superior to the other.^{1,2}

In this lecture we will show the most important data on the three vascular biomarkers, their limitations and weaknesses, and recommendations on the use of vascular biomarkers according to the ESC guidelines on CV prevention. In conclusion, routine measurement of vascular biomarkers in the assessment of CV risk is not recommended. Rational use of vascular biomarkers primarily in people with moderate CV risk may improve prevention of CV diseases.

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