A METHOD FOR DETECTING AN INCREASED RISK OF DEVELOPING SKIN CANCER AND A USE OF A GENOTYPE VARIANT OF THE GRHL3 GENE

PROBLEM DESCRIPTION

Skin cancer is the most common type of cancer in Caucasian population and non-melanoma skin cancers constitute the majority (~95%) of skin cancer cases. Many factors affect the risk of developing skin cancer; among the most important are genetic factors. There are no commercially available DNA tests to identify increased risk of developing non-melanoma skin cancers. Available tests concern malignant melanoma, which accounts for only ~5% of skin cancer cases.

STAGE OF DEVELOPMENT

DISCOVERY | VERIFIED ON HUMAN SAMPLES | MINIMAL VIABLE PRODUCT

CLINICAL TRIALS DONE

INNOVATION OF THE SOLUTION

The first DNA test to detect genetic predispositions to non-melanoma skin cancers. It is based on the identyfication of single nucleotide polymorphisms in the Grainyhead-like 3 gene (GRHL3), what may be performed utilizing standard in vitro diagnostic methods, such as e.g. real-time PCR.

THE MOST IMPORTANT ADVANTAGES

The only potentially available solution enabling non-melanoma skin cancer prevention.
Easy-to-access – DNA may be obtained from blood or by a cheek swab.
Implementable with other cancer diagnostic tests.

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PROJECT CORE TEAM

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KEY PUBLICATION

Kikulska A, et al. Coordinated expression and genetic polymorphisms in Grainyhead-like genes in human non-melanoma skin cancers. BMC Cancer. 2018 Jan 4;18(1):23

KEY WORDS

DIAGNOSTICS

DNA BIOMARKER

BLOOD BIOMARKER

CANCER

INTELLECTUAL PROPERTY STATUS

Patents granted in PL228062, US10000816, EP3083999
Priority date 03 Nov 2014

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