Validation of a cancer early-detection assay on liquid biopsies using dna methylation

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Abstract

There is growing awareness of the benefits of early detection of cancer:

• Early intervention can improve outcomes, resulting in a reduction on the health care burden of cancer, and can also provide information that could be used for personalized treatments.

• Liquid biopsies, allow quick, easy, noninvasive and real-time testing that is appropriate for screening and increase accessibility for developing countries.

• The use of epigenomics techniques, such as DNA methylation profiling, improves the depth and breadth of screening beyond standard genetics.

Universal Diagnostics (UDx), a respected pioneer in the field of early cancer detection, has partnered with Hologic Diagenode, which brings 20 years of experience in epigenomics, to develop a customized early detection workflow for colorectal cancer (CRC). This analysis relies on DNA methylation biomarkers identified within cell-free DNA (cfDNA) from plasma. The UDx assay provides not only easy screening but also a more comprehensive analysis than that possible with conventional markers. Genome-wide methylation profiles from healthy individuals and cancer patients were used to identify biomarkers. These biomarker candidates were then validated for performance; the results of which are presented in this poster.

Do you have any conflicts of interest?

No, I do not have a conflict of interest.