

DRDO lab develops antibody test kit for COVID-19

New Delhi, 21 May (India Science Wire): Defence Research and Development Organisation (DRDO) scientists have now got a new breakthrough after developing COVID-19 drug 2-DG. Institute of Physiology and Allied Sciences (DIPAS), a DRDO laboratory, has now developed an antibody detection-based kit 'DIPCOVAN', the DIPAS-VDx COVID-19 IgG Antibody Microwell ELISA for sero-surveillance. The kit has been developed in association with New Delhi based company, Vanguard Diagnostics Pvt Ltd.

DIPCOVAN kit can detect both spike as well as nucleocapsid proteins of SARS-CoV-2 virus with a high sensitivity of 97 per cent and specificity of 99 per cent. DIPCOVAN kit was developed indigenously followed by extensive validation on more than 1,000 patients at various COVID designated hospitals in Delhi. Three batches of the product were validated during last one year. The antibody detection kit is approved by Indian Council of Medical Research (ICMR) in April 2021, said a defence ministry statement on Friday.

DIPCOVAN is intended for the qualitative detection of IgG antibodies in human serum or plasma, targeting SARS-CoV-2 related antigens. It offers a significantly faster turn-around-time as it requires just 75 minutes to conduct the test without any cross reactivity with other diseases. The kit has a shelf life of 18 months.

In May 2021, the product received the regulatory approval from the Drugs Controller General of India (DCGI), Central Drugs Standard Control Organisation (CDSCO), Ministry of Health and Family Welfare, to manufacture for sale and distribution.

The kit is expected to be useful for understanding COVID-19 epidemiology and assessing an individual's previous SARS-CoV-2 exposure.

Defence Minister, Rajnath Singh has appreciated the efforts of DRDO and the industry in developing the kit at the time of need.

Secretary Department of Defence R&D & Chairman DRDO Dr G Satheesh Reddy complimented the teams involved in developing the kit and said the initiative will help the people during the pandemic.

Industry partner Vanguard Diagnostics Pvt. Ltd will commercially launch the product during the first week of June 2021. Readily available stock at the time of launch will be 100 kits (approx. 10,000 tests) with a production capacity of 500 kits per month after the launch. It is expected to be available at about Rs 75 per test. (India Science Wire)

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Antibody detection-based kit 'DIPCOVAN'