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LETTER TO THE EDITOR

'Virafin' A New Hope to Treat nCOVID-19 ? - An Editorial Letter

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The word compassionate indicates such medications, devices, and treatments which are presently under clinical trials to be used in particular disease condition when there is nothing left for treatment [1], [2]. In the recent emerging novel corona virus pandemic such compassionate use of an investigational drug named 'Virafin' has been started to use against the viral infection. Due to rapid upgrading of fresh nCOVID-19 cases again in 2021 in the country, the Drugs Controller General of India (DGCI) on Friday, April 23, have decided to give permission for the emergency use of 'Virafin' (Hepatitis C drug manufactured by Zydus Cadila) to treat adult patients who are showing moderate sign-symptoms [3]. The pharma company stated that the Pegylated Interferon alpha-2b (PegIFNα-2b) Virafin can be given only on the prescription basis recommended by registered medical practitioner and is meant for use in institutional setups or in hospitals for life saving purpose. Amid a incessant spike in the number of coronavirus cases in India, Zydus Cadila's 'Virafin' has been approved emergency use authorization (EUA) to treat moderate cases [4]. Multi-centric trial has been conducted recently in 20-25 centres across India and Virafin had shown lesser necessity for oxygen supply, that promisingly indicating it may be a probable emergency treatment option to control respiratory associated manifestation that has become most problematic limitations in case of positively infected nCOVID-19 patients. This therapeutic has also shown efficiency against additional viral infections. Dr. Sharvil Patel (Managing Director, Cadila Healthcare Limited) stated that it arrives at a much-needed time for patients and we will carry on to provide therapies in this pandemic situation. This drug is now under phase-III clinical trials and it shown improved clinical situations among the patients who are suffering from nCOVID-19. Throughout the trials, a superior proportion of patients were administered PegIFNα-2b and result found to be negative RT PCR after day 7 of treatment. The drug confirms quicker viral clearance and offers a number of advantages in comparison with other anti-viral drugs. Type-I interferons are body's primary defense line against various viral infections and Pegylated Interferon alpha-2b has shown promising effects to treat those infections effectively. Interferon alpha has also been involved as crucial part in the protection against SARS-CoV-2 which has been currently published in a leading journal. Moreover, aged (>60 years) patients are unable to produce sufficient amount of Interferon Alpha to fight against several viral infections and that decreased level of INF-α may cause higher mortality rate in nCOVID-19. At early stage of infection administration of 'virafin' can reduce the viral load from host cell and may enhance the recovery process. Phase-III trial stated that advanced proportion of patients in the PegIFNα-2b has showed a two point statistically considerable clinical enhancement (WHO 7-point ORDINAL SCALE) on day 8 while comparing with Standard of Care (SOC arm) (80.36 percent vs 68.18 percent respectively). It was also observed that requirement of oxygen supply was considerably lower in the PegIFNα-2b and as well as the time to resolution of signs and symptoms in comparison with SOC arm (5 days vs 6 days). These findings have indicated early administration of this drug can stop the further progress of nCOVID-19 infection successfully [5]. Previously, the Phase II clinical trials study have concluded about early safety, efficacy and tolerability of Virafin and specified important statistical clinical impact on moderately infected virus disease by dropping their viral load and also decreased the duration of oxygen supply [6]. A single dose of 'Virafin' through subcutaneous regimen can be used to manage of nCOVID-19 disease more safely. Throughout the Phase-III clinical trial of the drug, 91.15% of the nCOVID-19 infected patients who were given the bio-active, recovered from the

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infection within 7 days after the first dose (claimed by Zydus Cadila). It was also seen that in 2004 the drug was effective against first variant of coronavirus (SARS). Having positive response but there are few side effects after taking this medication as well such as influenza-like symptoms, and in few cases, there may be chances of altering blood composition and might result neuro-psychiatric associated manifestations. Till today several drugs have through clinical trial have and made available to stop the critical effects of nCOVID-19. A popular drug named 'Remdesivir' was used to give against nCOVID-19. There is also Favipiravir 200 mg (Glenmark Pharmaceuticals) an antiviral drug for the treatment of the virus. All these medicines are under anti-viral class, and fortunately nCOVID-19 infected patients had revealed positive improvements after taking those medications but with mild side effects. Hence, so far, it is impossible to suggest a drug that can successfully effective for the cure of nCOVID-19. In this moment World is urging for a medication which can immediately stop the growing death number. Hence based on the current demanding scenario Zydus Cadila is hopeful that the launched 'Virafin' will decrease the severity of the disease and possibly will be successful to reduce the mortality rates [7]. Therefore DGCI approved the compassionate use of this drug to save the life urgently in this critical situation. Being in medical profession I feel this drug has immense potential and will be able to provide support to the doctors and researchers in their fight against this emerging disease. Finally it is suggested for all that it must be taking only after consulting registered medical practitioner.

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