

Review of: "Interferon Gamma Therapy in a Novel Case of Homozygous Interferon Alpha/beta Receptor Alpha Chain (IFNAR1) Deficiency Infected With SARS-CoV-2"

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Potential competing interests: The author(s) declared that no potential competing interests exist.

The manuscript is highly topical particularly due to the type I IFNs involvement in innate immunity including response to covid-19. The content of the manuscript is certainly of significant clinical importance.

Table 2 is referred to in the manuscript but is not presented! This table supposedly includes the WES analysis and therefore the diagnosis of IFNAR1 deficiency. Without this table, the reader can not verify this observation and analysis. The table must be shared within the manuscript.

There is no direct evidence that the IFN γ treatment actually lead to the patients' recovery. There is a suggestion that IFN γ levels were measured – if so, these should be reported as data in the manuscript. In the discussion section, IFN γ functions are discussed – including activation of JAK/STAT pathway – aspects of this could have easily been measured to assess whether the IFN γ treatment has led to a response from the patient. It is likely impossible to do this now that the patient has fortunately recovered.

The manuscript has its limitations – particularly the lack of data to serve as evidence that IFN γ therapy is protective in these situations – however the content of the manuscript is certainly of significant clinical importance if IFN γ therapy can be proven to contribute to the recovery of patients with inborn errors in type I IFN pathway effectors. However, in the present publication there is no actual data or measurements to show that the IFN γ therapy actually lead to the patients recovery. It would have been helpful to have such data to support the authors observations of the patients recovery. The manuscript should be considered as a 'case report' only. For consideration as a mainstream scientific publication, the manuscript requires quantifiable data to support the efficacy of IFN γ therapy for such patients.