Drug Design, Development and Therapy

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RESPONSE TO LETTER

Utility of nintedanib for severe idiopathic pulmonary fibrosis: a single-center retrospective study [Response to letter]

This article was published in the following Dove Press journal:
Drug Design, Development and Therapy

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Dear editor

In our study, we observed that even in Severe Group of patients with interstitial pulmonary fibrosis (IPF), nintedanib administration suppressed the reduction in the forced vital capacity (FVC) (Figure 3).[1] However, the frequency of side effects tended to be more (Table 2) and the prognosis was significantly worse in Severe Group than in Mild Group (Figure 5).

Orsatti et al pointed out three limitations of our research.[2] First, the two study groups presented clinically meaningful differences at baseline. However, we found that even in Severe Group, FVC reduction was suppressed by nintedanib administration (p=0.029) (Figure 3). The INPULSIS-ON trial revealed that nintedanib administration in IPF patients with a more advanced functional impairment may have the same beneficial effect on FVC reduction as among patients with less severe impairment. However, we believe that it is important to demonstrate a beneficial effect among patients with severe IPF in the real world.

Second, a higher mortality rate among patients with severe IPF is expected independent of the pharmacological intervention; lower FVC and diffusing capacity of the lungs for carbon monoxide (D_{LCO}) seen at baseline among patients with severe IPF were associated with a worse prognosis. Clearly, patients with more severe disease have a worse prognosis. We suggested in our paper that patients with severe disease should start treatment earlier considering the poor prognosis.

Furthermore, our study revealed that patients with severe IPF had a greater FVC decline than those with mild-to-moderate IPF in the year preceding nintedanib administration. A more severe decline in FVC over time has also been associated with a worse prognosis. Hence, even in patients with severe IPF who experienced a more severe decline in FVC, we believe that it is important to clarify the usefulness of nintedanib in the real world.

We agree that it is important to conduct a multi-center prospective clinical trial. However, it may not often be feasible to compare treatment effect with a control group in the real world; retrospective research is also important in such circumstances.

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Disclosure

KTs has received lecture fee from Boehringer Ingelheim. The other authors report no conflicts of interest in this comminication.

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http://doi.org/10.2147/DDDT.S207537

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