A Prospective, Open-Label, Randomized Study Comparing Efficacy and Safety of Teneligliptin versus Sitagliptin in Indian Patients with Inadequately Controlled Type 2 Diabetes Mellitus: INSITES Study Mohan V, et al. J Assoc Physicians India 2019; 67 (10); 14-19.

- Teneligliptin is widely prescribed DPP-4 inhibitor in India because of its economical pricing, however there are no head on trials comparing it with Sitagliptin.
- This prospective, open-label, randomized, active-controlled study enrolled 76 patients. Patients received teneligliptin 20 mg or sitagliptin 100 mg orally once daily for 12 weeks as add-on to ongoing metformin or sulfonylurea therapy.
- At the end of 12 weeks, statistically significant reductions were observed in both teneligliptin and sitagliptin arms in HbA1c (-1.19 \pm 1.16% and -0.92 \pm 0.95%), in FBG (-28.3 \pm 63.0 mg/dL and -22.9 \pm 47.4 mg/dL) and PPBG (-41.3 \pm 85.4 mg/dL and -54.7 \pm 85.6 mg/dL) respectively. These reductions in all the glycemic parameters were similar between the arms.

In post-hoc comparison, percentage of patients achieving target HbA1c < 7% at week 12 favoured teneligliptin arm over sitagliptin arm (33.3% vs. 19.4%). Both gliptins were found to be safe and well-tolerated with no difference in the number of adverse events in Indian patients with T2DM.