

A comparison study on efficacy, insulin sensitivity and safety of Glimepiride/Metformin fixed dose combination versus Glimepiride single therapy on type 2 diabetes mellitus patients with basal insulin therapy.

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- A randomized, open-label, parallel, 16-week trial was conducted across 4 study centers.
- Ninety seven type 2 diabetic patients were selected and randomized into two groups:
 - Insulin glargine + fixed-dose combination (FDC) of glimepiride 1 mg and metformin 500 mg twice daily (the G/M group).
 - Insulin glargine + glimepiride 4 mg once daily (the G group).
- The G/M group was found to have experienced a significantly greater decrease in HbA1c, as well as PPG 2 h compared to the G group.
- Glimepiride with metformin therapy decreases blood glucose levels more effectively than high dose glimepiride group.

Combination of oral hypoglycemic agents and insulin has the synergistic effect.

Both, glimepiride/metformin/insulin and high dose glimepiride/insulin therapies are relatively safe but, former is more effective than high dose glimepiride/insulin therapy.