- In this cohort of individuals with type 2 diabetes mellitus who initiated insulin therapy, the probability of discontinuation was 82.0% within the first year of therapy, and, among those who discontinued early, there was a 90.3% probability of restarting within the year.
- The study revealed a distinct set of observable characteristics that are associated with early discontinuation of insulin therapy as well as with restarting of insulin for the subgroup of patients who discontinued early.
- Early discontinuation of insulin therapy was associated with significantly higher acute care (hospitalization and emergency services) costs, although outpatient costs, drug costs and total costs were lower among patients who discontinued early. Among patients who discontinued early, restarting of insulin was associated with higher acute care costs as well as significantly higher outpatient costs, drug costs, and total costs.
- Current findings highlight the economic ramifications of early discontinuation of insulin therapy, particularly through the first 90 days post-initiation. In addition, this study revealed predictors of early discontinuation and restart—predictors which may be helpful in designing patient-centered interventions to enhance persistence on therapy. Such interventions may in turn help reduce healthcare costs and improve patients' long term outcomes.

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