

Bradley C, Silvestre L and Witthaus E (2003) Improved treatment satisfaction and perceived metabolic control with insulin glargine, regardless of whether injected before breakfast, dinner or bedtime, in patients with Type 1 diabetes. *Diabetes & Metabolism* 29, 4S408, Abstract 2925

Abstract for poster presented at the 18th International Diabetes Federation Congress, Paris, France, Aug 24-29, 2003.

18th International Diabetes Federation Congress, 24 - 29 August 2003, Paris, France

Control/Tracking Number : A-03-2070-EASD

Activity : Abstract

Current Date/Time : 2/17/2003 2:19:57 PM

Improved treatment satisfaction and perceived metabolic control with insulin glargine, regardless of whether injected before breakfast, dinner or bedtime, in patients with Type 1 diabetes.

C. Bradley¹, L. Silvestre², E. Witthaus³;

¹University of London, Royal Holloway, Surrey, United Kingdom, ²Aventis Pharma R&D, Romainville, France, ³Health Outcomes Research, Covidence GmbH, Frankfurt, Germany.

Background and Aims: Insulin glargine (LANTUS[®]) is a once-daily basal insulin analogue that facilitates HbA_{1c} targets <7%. A recent study showed that insulin glargine, plus prandial insulin, is effective when injected either before breakfast, before dinner or at bedtime in patients with Type 1 diabetes. The effect of these administration times on treatment satisfaction and perceived metabolic control is presented.

Materials and Methods: This was an open-label, randomized, parallel group, multicentre, 24-week study, in which patients treated with insulin glargine plus prandial insulin before breakfast, before dinner or at bedtime completed the Diabetes Treatment Satisfaction Questionnaire status (DTSQs) at baseline and study endpoint.

Results: A total of 332/378 treated patients completed the DTSQs. At baseline, 275 (72.8%) patients in the clinically evaluated population had an injection time preference (118 [42.9%]: breakfast, 28 [10.2%]: dinner, 105 [38.2%]: bedtime); 24 (8.7%) preferred a combination. Mean (\pm standard deviation) baseline treatment satisfaction scores, when most patients were using NPH insulin, were 27.8 ± 5.0 , 27.4 ± 5.5 and 28.1 ± 5.3 in the breakfast, dinner and bedtime groups, respectively, and increased in all groups from baseline to endpoint (1.4, $p=0.079$; 2.5, $p=0.0002$; 1.8, $p=0.009$, respectively; paired t-test). The largest increases came from a change in the DTSQ convenience score (breakfast: 0.5, $p=0.005$; dinner: 0.8, $p=0.0001$; bedtime: 0.7, $p=0.0001$) and 'wish to continue' (breakfast: 0.4, $p=0.054$; dinner: 0.8, $p=0.0001$; bedtime: 0.6, $p=0.0007$). In terms of perceived metabolic control, the perceived frequency of hyperglycaemia decreased significantly at endpoint in the breakfast (-0.4 , $p=0.02$) and bedtime (-0.5 , $p=0.0005$) groups but not in the dinner group (-0.3 , $p=0.07$). Perceived frequency of hypoglycaemia decreased significantly in the three groups combined (-0.18 , $p=0.04$), but not in separate groups.

Conclusion: These data complement the clinical study results and, in addition, show treatment satisfaction improved with insulin glargine, regardless of injection time. Thus, insulin glargine can be used effectively according to individual patients' needs or preference, before breakfast, before dinner or at bedtime.

Topic/Keyword (Complete): H05 Patients outcomes

Status: Complete