



Rosuvastatin in South Asians with type 2 diabetes

R Ratnasabapathy, V Bravis and D Devendra
Brent NHS; Central Middlesex Hospital; Imperial College, London

Rosuvastatin has been shown to be the most potent statin at lowering LDL-C (low density lipoprotein cholesterol) and raising HDL-C (high density lipoprotein cholesterol). However, its ability to prevent major cardiovascular events (MCEs) is not yet established.

We evaluated the efficacy, tolerability and safety of rosuvastatin in the South Asian population with type 2 diabetes attending the North West London Hospitals NHS Trust. TC (total cholesterol), LDL and HDL before and after 24 months of treatment with rosuvastatin 10mg were analysed retrospectively. MCEs whilst on rosuvastatin were noted. CK (creatinine kinase) and ALT (alanine transaminase) were monitored. Patients on fibrates, niacin, omega-3 fatty acids, ezetimibe or insulin were excluded.

76 subjects were identified. Mean age was 64.5 years (SD 4.2). Mean duration of diabetes = 8.4 years (SD 1.2), number with previous MCE = 19. Mean LDL, TC and HDL before treatment were 3.185, 5.101 and 1.249mmol/L respectively. After 24 months of treatment mean LDL, TC and HDL were 2.022 (36.5% reduction, $p < 0.0001$), 3.986 (21.8% reduction, $p < 0.0001$) and 1.361 (8.9% increase, $p < 0.0001$) respectively. 50% of patients achieved LDL < 2 and 51.3% achieved TC < 4 . CK or ALT did not triple in any patients. 1.3% of patients had an MCE whilst on rosuvastatin.

Rosuvastatin 10mg is safe, tolerable and efficacious in reducing TC and LDL, and in increasing HDL, and appears to protect from cardiovascular events in South Asian type 2 diabetes patients after follow up of 2 years. We conclude that rosuvastatin is a good alternative statin when simvastatin cannot be tolerated or is unable to achieve lipid targets.

Time of arrival is not a surrogate for overall motivation: lack of correlation between glycaemic control and attendance for routine diabetes clinic care in a tertiary centre

Z Shahjahan¹ and K Dhatariya²
¹Foundation Year 1 Doctor; ²Consultant in Diabetes. Elsie Bertram Diabetes Centre, Norfolk & Norwich University Hospital NHS Trust

Aim. To determine if there is a correlation between glycaemic control and the arrival time at the diabetes clinic in relation to the appointment time.

Background. Previous work¹ has shown that people who attend the diabetes clinic have better glycaemic control than in chronic non-attenders.² Attendance at a specialist clinic is part of the motivation necessary to improve self-management skills.³ However, what has not previously been shown is whether the time of arrival to clinic is related to glycaemic control as a measure of this overall motivation.

Methods. All patients attending a single secondary care specialist diabetes clinic were sent a reminder letter 3 weeks prior to their appointment. The letter stated that individuals should attend the clinic 30 minutes prior to the appointment time to allow for HbA_{1c} measurements to be available. Patients were timed on their arrival in relation to their stipulated appointment times. The time difference (either early, on time, or late arrival) was correlated with their HbA_{1c} done on the same clinic day.

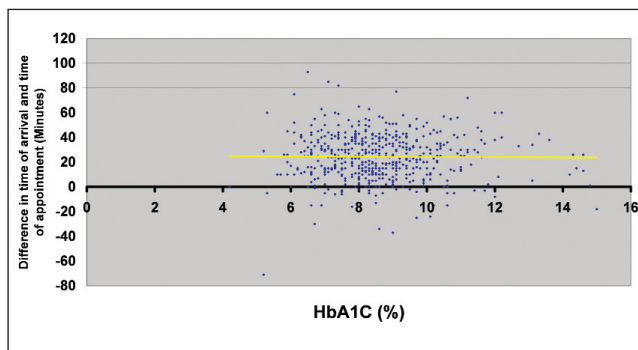
Results. 555 patients attended during a 4-week period. 93.7% (n=520) arrived on or before their designated appointment time. 6.3% (n=35) turned up late. The results show there is no correlation between the time of attendance, type of clinic attended and glycaemic control, $R^2 = < 0.001$. (See Figure 1.)

Conclusions. Time of arrival to clinic in relation to appointment time was not related to overall glycaemic control in this cohort of secondary care patients.

References

- Gulliford MC, Ashworth M, Robotham D, *et al.* Achievement of metabolic targets for diabetes by English primary care practices under a new system of incentives. *Diabetic Med* 2007; **24**: 505–511.

Figure 1. Relationship between diabetes clinic arrival time and HbA_{1c}



- Rohland BM. Appointment attendance predicts level of glycaemic control in people with diabetes. *Evidence-based Healthcare* 2004; **8**: 195–196.
- Heisler M, Piette JD, Spencer M, *et al.* The relationship between knowledge of recent HbA_{1c} values and diabetes care understanding and self-management. *Diabetes Care* 2005; **28**: 816–822.

Differential effects of intravenous and subcutaneous sliding scale insulin regimens used to improve blood glucose levels in a tertiary care setting

E Swan¹ and K Dhatariya²
¹15th Year Medical Student, School of Medicine, Health Policy and Practice, University of East Anglia, Norwich; ²Consultant in Diabetes, Elsie Bertram Diabetes Centre, Norfolk & Norwich University Hospital NHS Trust

Background. The use of insulin sliding scales (SS) has been heavily criticised, with their use being described as ineffective or dangerous.^{1–3} However, despite this, over half of all hospitals in the UK still recommend their use.⁴

Aim. To determine if current insulin SS regimens are effectively used in our institution.

Methods. A retrospective case notes analysis of IV (n=48), and SC (n=15) SS in a single university teaching hospital between September 2007 and February 2008.

Results. Overall, pooled results showed no improvement of blood glucose levels for those on SC SS (8.78 vs 7.68mmol/L, $p=0.31$). In the IV arm, there was a significant reduction in mean blood glucose levels over time (11.38 vs 7.6mmol/L, $p=0.005$).

Discussion. Patients who are admitted with another condition unrelated to their diabetes often have longer lengths of stay than those admitted with a primary diabetes related diagnosis.⁵ This is thought in part to be due to the perception that the management of diabetes is an 'added burden' in addition to a possible lack of knowledge amongst nursing staff on non-metabolic speciality wards.

Summary. We have shown that the use of IV SS leads to better glycaemic control but that SC SS insulin does not. However, our data also show that the use of these tools prevents the potential worsening of glycaemic control secondary to forced immobility and the stress of hospitalisation.

References

- Abourizk NN, Vora, CK, Verma PK. Inpatient diabetology. The new frontier. *J Gen Intern Med* 2004; **19**: 466–471.
- Clement S, Braithwaite SS, Magee ME, *et al.* Management of diabetes and hyperglycemia in hospitals. *Diabetes Care* 2004; **27**: 553–557.
- Queale WS, Seidler AJ, Brancati FL. Glycemic control and sliding scale insulin use in medical inpatients with diabetes mellitus. *Arch Intern Med* 1997; **157**: 545–552.
- Sampson MJ, Brennan C, Dhatariya K, *et al.* A national survey of inpatient diabetes services in the United Kingdom. *Diabetic Med* 2007; **24**: 643–649.
- Sampson MJ, Crowle T, Dhatariya K, *et al.* Trends in bed occupancy for inpatients with diabetes before and after the introduction of a diabetes inpatient specialist nurse service. *Diabetic Med* 2006; **23**: 1008–1015.