

# CHANGES IN PATIENT CHARACTERISTICS, GLUCOSE LOWERING TREATMENT, GLYCEMIC CONTROL AND COMPLICATIONS IN TYPE 2 **DIABETES IN GENERAL PRACTICES (DISEASE ANALYZER, GERMANY:** 2008-2016)

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## **OBJECTIVES**

The objectives were to examine long-term changes in type 2 diabetes patient characteristics, diabetes treatment, control and complications in general practices.

#### **METHODS**

All type 2 diabetes patients were identified in a representative general practice database (Disease Analyser, Germany) in three periods (01/2008-12/2008: n = 90.866, 818 practices, mean age (SD): 67.6 (12.1) years, 51% males; 01/2012-12/2012: n = 179.923, 1.158 practices, 68.3 (12.6) years, 51% males; 10/2015-09/2016: n = 201.667, 1.184 practices, 68.2 (12.9) years, 52% males). Chi-square and Wilcoxon rank-sum tests were used for testing differences (2008 vs. 2015/16).

## **RESULTS**

The mean number of type 2 patients per practice increased (2008: 111; 2015/16: 170). The proportion of retirees declined (74% vs. 61%) and patients in the working population increased (18% vs. 28%) (all p < 0.001). There were no relevant changes in mean HbA1c (7.1% vs. 7.2%), fasting blood glucose (141 mg/dl vs. 144 mg/dl) and BMI (31 kg/m2 vs.

32 kg/m2), whereas total cholesterol (204 mg/dl vs. 196 mg/dl) and triglycerides (159 mg/dl vs. 153 mg/dl) slightly declined (all p < 0.001). Prescription use of metformin, dipeptidyl peptidase-4 (DPP-4) and sodium dependent glucose transporter-2 (SGLT-2) inhibitors and glucagon-like peptide-1 (GLP-1) receptor agonists enlarged (dual or triple combinations) while sulfonylurea use decreased. Prevalence of polyneuropathy (6.2% vs. 8.6%), nephropathy (1.9% vs. 3.2%) and depression (7.6% vs. 10.0%) rised (all p < 0.001).

### **CONCLUSIONS**

General practitioners play a key role in diabetes care, increasingly treating type 2 diabetes patients in the working population. There was no change in glycemic control over the study period (2008-2016). The use of glucose-lowering drug combinations increased and microvascular complications were more often recorded.

Published in: Postgrad Med. 2018 Mar;130(2):244-250. doi: 10.1080/00325481.2018.1421842. Epub 2018 Jan 1



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Thank you for your interest!