

Incidence of Side Effects of Antihypertensive Drugs in Relation to Age and Compliance to Treatment

E.C. Yiannakopoulou, J.S. Papadopoulos, D.V. Cokkinos and TS. Mountokalakis

Department of Experimental Pharmacology, Medical School, University of Athens, M. Asias 75, 115 27 Athens, Greece

AIM

To assess the incidence of side effects of antihypertensive drugs and to find out to what extent they are influenced by age and interfere with adherence to antihypertensive treatment.

METHODS

The survey involved 1000 patients who were under antihypertensive treatment for at least 5 years. Data collection was obtained through a questionnaire that included questions on demographic information, current and previous antihypertensive regimen, side effects associated with antihypertensive medicines and on patient compliance to treatment.

RESULTS

63.5% of patients were on monotherapy, 25.5% on two drugs, 9.5% on three drugs, 1.5% on four drugs. Of the patients on monotherapy, 299 were on diuretics, 201 on ACE inhibitors, 72 on calcium antagonists, 47 on β -blockers, 9 on α -blockers and 4 on AT II receptor antagonists. As a whole, considering both monotherapy and combination therapy, diuretics (45%), ACE inhibitors (35.1%), calcium antagonists (34.0%) and β -blockers (30.8%) were the most frequently pre-

scribed medicines. Side effects of the antihypertensive medicines were reported by 42% of the hypertensives. They were more common among older people (55.2% among those >60 vs 33.4% among those <60 years of age). Compliance to antihypertensive treatment was more common among hypertensives who did not report side effects (24% vs 2.6% among those who reported side effects, $P < 0.005$). On the other hand, 20% of non-compliers attributed their non-adherence to treatment, to the side effects of antihypertensive medicines. Moreover, 38% of the respondents reported that they had switched to their current medication regimen because of side effects. The most common reported side effects were fatigue (12%), orthostatic hypotension (12%), cough (8%), gout (7%), muscle cramps (5%), ankle swelling (5%), flushing (4%), headache (4%), dizziness (4%), gastrointestinal disorders (3%), decrease of libido (4%), allergic reactions (1.5%), dry mouth (1.6%), dementia (2%), palpitation (2.5%)

CONCLUSION

Side effects of antihypertensive medicines are more common among elderly hypertensives and influence adversely compliance to treatment.