

Medikamentöse Therapie der Atherosklerose

Axel Schmermund, Frankfurt, Heinrich Wieneke und Raimund Erbel, Essen

Literatur

1. Agostoni C, Riva E, Scaglioni S, Marangoni F, et al. Dietary fats and cholesterol in italian infants and children. *Am J Clin Nutr* 2000;72(Suppl. 5):1384S–91S.
2. Altschul R, Hoffer A, Stephen JD. Influence of nicotinic acid on serum cholesterol in man. *Arch Biochem* 1955;54:558–9.
3. Anand SS, Yusuf S. Oral anticoagulant therapy in patients with coronary artery disease: a meta-analysis. *JAMA* 1999;282:2058–67.
4. Antiplatelet Trialists' Collaboration. Collaborative overview of randomised trials of antiplatelet therapy – I: Prevention of death, myocardial infarction, and stroke by prolonged antiplatelet therapy in various categories of patients. *BMJ* 1994;308:81–106.
5. Ballantyne CM, Hourii J, Notarbartolo A, Melani L, et al., Ezetimibe Study Group. Effect of ezetimibe coadministered with atorvastatin in 628 patients with primary hypercholesterolemia: a prospective, randomized, double-blind trial. *Circulation* 2003;107:2409–15.
6. Bellosa S, Paoletti R, Corsini A. Safety of statins: focus on clinical pharmacokinetics and drug interactions. *Circulation* 2004;109(Suppl 1):III50–7.
7. Bonetti PO, Lerman LO, Napoli C, Lerman A. Statin effects beyond lipid lowering – are they clinically relevant? *Eur Heart J* 2003;24:225–48.
8. Brown G, Albers JJ, Fisher LD, Schaefer SM, et al. Regression of coronary artery disease as a result of intensive lipid-lowering therapy in men with high levels of apolipoprotein B. *N Engl J Med* 1990;323:1289–98.
9. Brown BG, Zhao XQ, Chait A, et al. Simvastatin and niacin, antioxidant vitamins, or the combination for the prevention of coronary disease. *N Engl J Med* 2001;345:1583–92.
10. Cannon CP, Braunwald E, McCabe CH, et al. Pravastatin or atorvastatin evaluation and infection therapy-thrombolysis in myocardial infarction 22 investigators. Intensive versus moderate lipid lowering with statins after acute coronary syndromes. *N Engl J Med* 2004;350:1495–504.
- 10a. Cannon CP, Braunwald E, McCabe CH, et al. Antibiotic treatment of Chlamydia pneumoniae after acute coronary syndrome. *N Engl J Med* 2005;352:1646–54.
11. CAPRIE steering committee. A randomised, blinded, trial of clopidogrel versus aspirin in patients at risk of ischaemic events (CAPRIE). *Lancet* 1996;348:1329–39.
12. Colhoun HM, Betteridge DJ, Durrington PN, et al. CARDS investigators. Primary prevention of cardiovascular disease with atorvastatin in type 2 diabetes in the collaborative atorvastatin diabetes study (CARDS): multicenter randomised placebo-controlled trial. *Lancet* 2004;364:685–96.
13. Dahlöf B, Devereux RB, Kjeldsen SE, Julius S, et al., for the LIFE study group. Cardiovascular morbidity and mortality in the Losartan intervention for endpoint reduction in hypertension study (LIFE): a randomised trial against atenolol. *Lancet* 2002;359:995–1003.
14. De Backer G, Ambrosioni E, Borch-Johnsen K, et al. Executive summary. European guidelines on cardiovascular disease prevention in clinical practice. Third joint task force of European and other societies on cardiovascular disease prevention in clinical practice. *Eur Heart J* 2003;24:1601–10.
15. Descamps OS, Bruniaux M, Guilmot PF, Tonglet R, et al. Lipoprotein concentrations in newborns are associated with allelic variations in their mothers. *Atherosclerosis* 2004;172:287–98.
16. Downs JR, Clearfield M, Weis S, et al. Primary prevention of acute coronary events with lovastatin in men and women with average cholesterol levels: results of AFCAPS/TexCAPS. Air Force/Texas coronary atherosclerosis prevention study. *JAMA* 1998;279:1615–22.
17. Dujovne CA, Ettinger MP, McNeer JF, Lipka LJ, et al., ezetimibe study group. Efficacy and safety of a potent new selective cholesterol absorption inhibitor, ezetimibe, in patients with primary hypercholesterolemia. *Am J Cardiol* 2002;90:1092–7.
18. Fox KM, European trial on reduction of cardiac events with perindopril in stable coronary artery disease investigators. Efficacy of perindopril in reduction of cardiovascular events among patients with stable coronary artery disease: randomised, double-blind, placebo-controlled, multicentre trial (the EUROPA study). *Lancet* 2003;362:782–8.
19. Frick MH, Elo O, Haapa K, Heinonen OP, et al. Helsinki heart study: primary-prevention trial with gemfibrozil in middle-aged men with dyslipidemia. Safety of treatment, changes in risk factors, and incidence of coronary heart disease. *N Engl J Med* 1987;317:1237–45.
20. Gaspoz JM, Coxson PG, Goldman PA, et al. Cost effectiveness of aspirin, clopidogrel, or both for secondary prevention of coronary heart disease. *N Engl J Med* 2002;346:1800–6.
21. Gotto AM Jr, Whitney E, Stein EA, et al. Relation between baseline and on-treatment lipid parameters and first acute major coronary events in the Air Force/Texas coronary atherosclerosis prevention study (AFCAPS/TexCAPS). *Circulation* 2000;101:477–84.
22. Grundy SM, Cleeman JI, Merz CNB, et al. for the Coordinating Committee of the National Cholesterol Education Program. Implications of recent clinical trials for the National Cholesterol Education Program. Adult treatment panel III guidelines. *Circulation* 2004;110:227–39.

Priv.-Doz. Dr. Axel Schmermund, Cardioangiologisches Centrum Bethanien (CCB), Im Prüfling 23, 60389 Frankfurt, E-Mail: A.Schmermund@ccb.de
Heinrich Wieneke, Prof. Dr. Raimund Erbel, Klinik für Kardiologie, Westdeutsches Herzzentrum Essen, Universitätsklinikum Essen, Hufelandstraße 55, 45122 Essen,

23. Gualandri V, Franceschini G, Sirtori CR, Gianfranceschi G, et al. A-I Milano apoprotein identification of the complete kindred and evidence of a dominant genetic transmission. *Am J Hum Genet* 1985;37:1083–97.
24. Heart protection study collaborative group. MRC/BHF heart protection study of cholesterol lowering with simvastatin in 20 536 high-risk individuals: a randomised placebo-controlled trial. *Lancet* 2002;360:7–22.
25. Hedblad B, Wikstrand J, Janzon L, Wedel H, et al. Low-dose metoprolol CR/XL and fluvastatin slow progression of carotid intima-media thickness: Main results from the beta-blocker cholesterol-lowering asymptomatic plaque study (BCAPS). *Circulation* 2001;103:1721–6.
- 25a. LaRosa JC, Grundy SM, Waters DD, et al. for the Treating to New Targets (TNT) Investigators. Intensive lipid lowering with atorvastatin in patients with stable coronary disease. *N Engl J Med* 2005;352:1425–35.
26. Lauer MS. Clinical practice. Aspirin for primary prevention of coronary events. *N Engl J Med* 2002;346:1468–74.
27. Long-term intervention with pravastatin in ischaemic disease (LIPID) study group. Prevention of cardiovascular events and death with pravastatin in patients with coronary heart disease and a broad range of initial cholesterol levels. *N Engl J Med* 1998;339:1349–57.
28. Lonn E, Yusuf S, Dzavik V, et al., SECURE investigators. Effects of ramipril and vitamin E on atherosclerosis: the study to evaluate carotid ultrasound changes in patients treated with ramipril and vitamin E (SECURE). *Circulation* 2001;103:919–95.
29. Münzel T, Keaney JF Jr. Are ACE inhibitors a „magic bullet“ against oxidative stress? *Circulation* 2001;104:1571–4.
30. Nissen SE, Tsunoda T, Tuzcu EM, et al. Effect of recombinant ApoA-I Milano on coronary atherosclerosis in patients with acute coronary syndromes. *JAMA* 2003;290:2292–300.
31. Nissen SE, Tuzcu EM, Schoenhagen P, et al., REVERSAL investigators. Effect of intensive compared with moderate lipid-lowering therapy on progression of coronary atherosclerosis: a randomized controlled trial. *JAMA* 2004;291:1071–80.
32. Nissen SE. High-dose statins in acute coronary syndromes. Not just lipid levels. *JAMA* 2004;292:1365–7.
33. Nissen SE, Tuzcu EM, Libby P, et al. Effect of antihypertensive agents on cardiovascular events in patients with coronary disease and normal blood pressure. The CAMELOT study: a randomized controlled trial. *JAMA* 2004;292:2217–26.
34. O’Keefe JH Jr, Cordain L, Harris WH, Moe RM, et al. Optimal low-density lipoprotein is 50 to 70 mg/dl. Lower is better and physiologically normal. *J Am Coll Cardiol* 2004;43:2142–6.
35. Pedersen TR, Kjeshus J, Berg K, et al. Randomised trial of cholesterol lowering in 4 444 patients with coronary heart disease: the Scandinavian simvastatin survival study (4S). *Lancet* 1994;344:1383–9.
36. PROGRESS collaborative group. Randomised trial of a perindopril-based blood-pressure-lowering regimen among 6,105 individuals with previous stroke or transient ischaemic attack. *Lancet* 2001;358:1033–41.
37. Rubins HB, Robins SJ, Collins D, et al. Gemfibrozil for the secondary prevention of coronary heart disease in men with low levels of high-density lipoprotein cholesterol. Veterans affairs high-density lipoprotein cholesterol intervention trial study group. *N Engl J Med* 1999;341:410–8.
38. Sacks FM, Pfeffer MA, Moye LA, et al. The effect of pravastatin on coronary events after myocardial infarction in patients with average cholesterol levels: Cholesterol and recurrent events trial investigators. *N Engl J Med* 1996;335:1001–9.
39. Sever PS, Dahlöf B, Poulter NR, et al. Prevention of coronary and stroke events with atorvastatin in hypertensive patients who have average or lower-than-average cholesterol concentrations, in the Anglo-Scandinavian cardiac outcomes trial-lipid lowering arm (ASCOT-LLA): a multicenter randomised controlled trial. *Lancet* 2003;361:1149–58.
40. Shepherd J, Cobbe SM, Ford I, et al. for the West of Scotland coronary prevention study group. Prevention of coronary artery disease with pravastatin in men with hypercholesterolaemia. *N Engl J Med* 1995;333:1301–7.
41. Sirtori CR, Calabresi L, Franceschini G, Baldassarre D, et al. Cardiovascular status of carriers of the apolipoprotein A-I (Milano) mutant: the Limone sul Garda study. *Circulation* 2001;103:1949–54.
42. Smilde TJ, van Wissen S, Wollersheim H, Trip MD, et al. Effect of aggressive versus conventional lipid lowering on atherosclerosis progression in familial hypercholesterolaemia (ASAP): a prospective, randomised, double-blind trial. *Lancet* 2001;357:577–81.
43. Smith SC Jr., Blair SN, Bonow RO, et al. AHA/ACC scientific statement: AHA/ACC guidelines for preventing heart attack and death in patients with atherosclerotic cardiovascular disease: 2001 update: A statement for healthcare professionals from the American Heart Association and the American College of Cardiology. *Circulation* 2001;104:1577–9.
44. Staffa JA, Chang J, Green L. Cerivastatin and reports of fatal rhabdomyolysis [letter]. *N Engl J Med* 2002;346:539–40.
45. Sudhop T, Lutjohann D, Kodal A, Igel M, et al. Inhibition of intestinal cholesterol absorption by ezetimibe in humans. *Circulation* 2002;106:1943–8.
46. Taylor AJ, Kent SM, Flaherty PJ, Coyle LC, et al. ARBITER: Arterial biology for the investigation of the treatment effects of reducing cholesterol: a randomized trial comparing the effects of atorvastatin and pravastatin on carotid intima medial thickness. *Circulation* 2002;106:2055–60.
47. The Coronary Drug Project Research Group. Clofibrate and niacin in coronary heart disease. *JAMA* 1975;231:360–81.
48. Thelle D. Prevention of cardiovascular diseases: a scientific dilemma. *Scand Cardiovasc J* 2000;34:103–5.
49. The PEACE Trial Investigators. Angiotensin-converting-enzyme inhibition in stable coronary artery disease. *N Engl J Med* 2004;351:2058–68.
50. Third report of the national cholesterol education program (NCEP) expert panel on detection, evaluation, and treatment of high blood cholesterol in adults (adult treatment panel III). Final report. *Circulation* 2002;106:3143–421.
51. Topol EJ. Intensive statin therapy – a sea change in cardiovascular prevention. *N Engl J Med* 2004;350:1562–4.
52. Vartiainen E, Jousilahti P, Alftan G, Sundvall J, et al. Cardiovascular risk factor changes in Finland, 1972–1997. *Int J Epidemiol* 2000;29:49–56.
53. Wieneke H, Schmermund A, Erbel R. Niacin – Ein komplementärer Therapieansatz zur Optimierung des Lipidprofils. *Med Klin* 2005;100:186–92.
54. Windler E, Zyriax BC. Lebensstiländerungen zur Prävention koronarer Herzkrankheit. *Herz* 2001;26:513–22.
55. World Health Organization European Collaborative Group. European collaborative trial of multifactorial prevention of coronary heart disease. Final report on the 6-year results. *Lancet* 1986;1:869–72.
56. Yusuf S, Sleight P, Pogue J, Bosch J, et al. Effects of an angiotensin-converting-enzyme inhibitor, ramipril, on cardiovascular events in high-risk patients. The heart outcomes prevention evaluation study investigators. *N Engl J Med* 2000;342:145–13.