health opportunity that would have a significant impact in reducing CHD and stroke throughout the world.

DAVID WALD Consultant Cardiologist and Senior Lecturer Wolfson Institute of Preventive Medicine Barts and the London School of Medicine

#### References

- Wood DA, Wray R, Poulter N et al. JBS2: Joint British guidelines on prevention of cardiovascular disease in clinical practice. Heart 2005;91(Suppl V):v1–52.
- Wald DS. The future of coronary heart disease prevention. *Clin Med* 2007;7:392–6.
- 3 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;360:7–22HPS.
- 4 EUROPA Study 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.
- 5 Gaede P, Vedel P, Larsen N, Parving H-H, Pederson O. Multifactorial intervention and cardiovascular disease in patients with type 2 diabetes. N Eng J Med 2003;348:383–93.
- 6 Hippisley-Cox J, Coupland C. Effect of combinations of drugs on all cause mortality in patients with ischaemic heart disease in patients: nested case-control analysis. BMJ 2005;330:1059–63.

## Atrial fibrillation - all change!

Editor – In the valuable review of atrial fibrillation (AF) by Savelieva and Camm (*Clin Med* August 2007 pp 374–9) I was delighted to see emphasis on the value of control of the ventricular rate, presumably to augment ventricular filling, particularly in older subjects where the ventricle is less compliant (the physiological third of ventricular filling sound disappears quite early in life).

I disagree, however, that the awareness of asymptomatic or silent AF has only been recognised recently since 'lone atrial fibrillation' as it was called by Sir John Parkinson and William Evans at the London Hospital in the 1940s was well recognised and regarded as a benign condition if there was no evidence of underlying heart disease, and particularly no enlargement of the left atrium on X-ray screening in the right oblique position. Of course this has been

superseded by the echocardiogram. Thus I have had a lifelong interest in lone AF and never used warfarin in such cases because the risk is appreciable though small. In 50 years of special interest in lone AF I have never seen an embolus and have never had to start warfarin in this special group. It seems that there is little risk of clotting from stasis in the left atrium when both the left ventricle and left atrium are completely normal. Sadly, I do not have statistical evidence for this view but I think it would be shared by those who have had a long dayto-day experience of clinical cardiology. Furthermore, I doubt whether such a careful selection of cases is possible in most large statistical studies. Of course the decision not to give warfarin can only be made after a very careful investigation by a cardiologist and a careful echo study. Sadly, I have seen junior cardiologists starting warfarin in a patient with unexplained AF without even performing an echo.

> AUBREY LEATHAM Emeritus Cardiologist to St George's Hospital National Heart Hospital; formally Dean of the Institute of Cardiology

#### In response

Editor - Dr Leatham correctly points out that lone atrial fibrillation (AF) (ie, AF associated with no structural heart disease) has long been recognised by the medical community. Indeed, cases of lone AF were described by Parkinson and Campbell in 1930 who found no associated heart disease in 15% of their 200 cases of paroxysmal AF.1 William Evans and Peter Swann proposed the term lone AF in 1953 in their publication on 20 patients with no evidence of cardiac enlargement, mitral stenosis, hypertension, or thyrotoxicosis.<sup>2</sup> After reviewing the patients' history for over 10 to 20 years, they concluded that 'the condition did not jeopardize life in a single instance, and did not even prove a handicap to the majority'. The 1987 report from the Mayo Clinic concerning 97 patients with lone AF from Olmsted County, who were 60 years old or younger at diagnosis, confirmed that lone AF in this setting is associated with a very low risk of stroke and that routine anticoagulation may not be warranted.3 In this cohort, four patients (1.3%) had strokes and the overall survival rate was 95% at 15 years. Conversely, lone AF occurring after age 60 years in the Olmsted County population was a risk marker for a substantial increase in cardio-vascular events (5.0%  $\nu$  1.3% per person-years) as well as rates of stroke and transient ischaemic attacks (0.9% and 1.1%  $\nu$  0.2% and 0%) compared with non-AF patients that warrants consideration for antithrombotic therapy.<sup>4</sup>

Subsequently, the Framingham study investigators reported significantly greater rates of stroke (more than fourfold) in 43 patients with lone AF compared with matched controls without AF.<sup>5</sup> The most striking evidence that lone AF may not be entirely a benign condition came from the Paris Prospective Study which reported a nearly twofold increase in risk of death and particularly cardiovascular mortality in individuals affected by AF but with no structural heart abnormality.<sup>6</sup>

In 1930, Parkinson and Campbell described AF associated with reversible cardiomyopathy after restoration of sinus rhythm by quinidine<sup>1</sup> and since then several reports have suggest that uncontrolled AF may cause frank congestive heart failure in the absence of any structural heart disease and that upon cessation of the arrhythmia, complete recovery of left ventricular function may follow.<sup>7</sup> Hence the recent National Institute for Health and Clinical Excellence guidelines on AF emphasise the role of echocardiography as an essential part of the clinical investigation of a patient with newly discovered AF.

While lone AF is not associated with any heart disease by definition, silent (or asymptomatic) AF often can occur in association with almost any cardiovascular pathology. The hazard of silent AF lies in the fact that it poses the same risk of stroke or tachycardia-induced cardiomyopathy if untreated, but often goes unrecognised both by the patient and the physician. As a result, many patients may be denied potentially life-saving therapy such as anticoagulation. In the Framingham study, 21 (18%) out of 115 patients with acute stroke had AF discovered for the first time on admission for stroke and five were admitted with sinus rhythm but developed AF after admission.8 Whether AF in an asymptomatic form was present before stroke or developed as its consequence remains speculative; however 92% of subjects presenting with newly discovered AF at the time of acute stroke continued to have this arrhythmia in a chronic or paroxysmal form suggesting that AF preceded the cerebrovascular event. Older individuals with persistent or permanent AF who are at increased risk of stroke, more commonly suffer either asymptomatic AF or AF associated with mild non-specific symptoms. Higher rates of stroke and congestive heart failure were reported in patients with silent AF in the population-based study in Olmsted County compared with symptomatic patients (17%  $\nu$  13% (p=0.18) and 14%  $\nu$  8% (p=0.025), respectively).

The high prevalence and potential danger of silent AF has been emphasised by recent data from modern pacemakers and cardioverter-defibrillators: 50-60% patients may have unsuspected episodes of the arrhythmia, with almost half of these patients having paroxysms that last more than 48 hours. 10 Patients with episodes of fast atrial rates detected by a pacemaker in the MOST (Mode Selection Trial) study were more than twice as likely to die or have a stroke as similar patients without atrial high rate events.<sup>11</sup> Prospective studies such ASSERT (Asymptomatic Fibrillation and Stroke Evaluation in Pacemaker Patients and the Atrial Fibrillation Reduction Atrial Pacing Trial), have now been instigated in order to clarify the implications of asymptomatic atrial tachyarrhythmias documented by implantable rhythm control devices with regard to the risk of stroke.

> IRINA SAVELIEVA Lecturer in Cardiology JOHN CAMM

Professor of Clinical Cardiology and Head of Division

Division of Cardiac and Vascular Sciences St George's University of London

### References

- 1 Parkinson J, Campbell M. Quart J Med 1930:23:67.
- 2 Evans W, Swann P. Lone auricular fibrillation. *Am Heart J* 1953:189–94.
- 3 Kopecky SL, Gersh BJ, McGoon MD *et al.* The natural history of lone atrial fibrillation: A population-based study over three decades. *N Engl J Med* 1987;317:669–74.
- 4 Kopecky SL, Gersh BJ, McGoon MD *et al.* Lone atrial fibrillation in elderly persons: a marker for cardiovascular risk. *Arch Intern Med* 1999;159:1118–22.

- 5 Brand FN, Abbott RD, Kannel WB, Wolf PA. Characteristics and prognosis of lone atrial fibrillation: 30-year follow-up in the Framingham Study. *JAMA* 1985;254: 3449–53.
- 6 Jouven X, Desnos M, Guerot C, Ducimetiere P. Idiopathic atrial fibrillation as a risk factor for mortality: the Paris Prospective Study I. *Eur Heart J* 1999;20: 896–9.
- 7 Savelieva I, Camm AJ. Clinical relevance of silent atrial fibrillation: prevalence, prognosis, quality of life, and management. J Interv Card Electrophysiol 2000;4:369–82.
- 8 Lin HJ, Wolf PA, Benjamin EJ et al. Newly diagnosed atrial fibrillation and acute stroke: the Framingham study. Stroke 1995;26:1527–30.
- 9 Miyasaka Y, Gersh BJ, Rosales AG et al. Silent atrial fibrillation: an important contributor to total budern of atrial fibrillation in Olmsted County, MN (1980–1989). J Am Coll Cardiol 2004;43 (Abstract).
- 10 Israel CW, Grönefeld G, Ehrlich JR et al. Long-term risk of recurrent atrial fibrillation as documented by an implantable monitoring device: implications for optimal patient care. J Am Coll Cardiol 2004;43:47–52.
- 11 Glotzer TV, Hellkamp AS, Zimmerman J et al, for the MOST Investigators. Atrial high rate episodes detected by pacemaker diagnostics predict death and stroke: report of the atrial diagnostics ancillary study of the Mode Selection Trial (MOST). Circulation 2003;107:1614–9.

# Conversation with Charles: briefing the media

The current 'Conversation with Charles' (Clin Med October 2007 pp 533–4) raises some valuable points and many issues relevant to the Science Media Centre (SMC). The SMC is based in the Royal Institution in London and is an independent press office for science in the news. Funded by over 70 different organisations, from small scientific societies, to larger institutions, such as the Royal Society and Medical Research Council, and pharmaceutical companies, we are in a position to provide UK national news journalists with good evidence-based experts to interview.

We agree that it is very difficult for journalists to decide whose opinion to trust and to know the difference between a good expert and a bad one. As *Coemgenus* points out, deciding whose opinion to listen to is also challenging within the scientific and

clinical community and it is understandably even harder for those who are outside the relevant discipline. It is also our experience that journalists are generally open to constructive criticism, and are often happy to be contacted by an expert offering their help if the issue comes up in the news again. Most journalists do not have an agenda - they simply want to get good information across and the greater access to evidence-based information from good experts the easier it is for them to write a fair and balanced story. A word of caution though, on balance, we find that journalists receive a large amount of criticism (often undeserved) and are rarely praised when they do justice to an issue. Most science and health journalism is of a good standard and receiving continued criticism can make the job of a journalist a thankless task. So we would encourage clinicians to also get in touch with journalists when they are pleased about the way something is covered.

The article raises concerns about whether the media is well served finding experts on clinical and medical issues. The SMC is regularly contacted on health issues and will find clinicians for journalists to interview, for example, respiratory clinicians on avian flu, or surgeons on the latest development in organ donation or the first face transplant. Though we do not have a 24-hour service all the time, if a big news story breaks we do drop everything and find good experts to work with all major news outlets - whether it happens to be Friday night, Sunday morning or even Christmas day. When a science or health story breaks we call the different programmes/journalists directly to provide them with a comprehensive list of experts. They are always delighted to hear from us as they have often been struggling to work out who is the best expert, and more importantly, how they are going to get hold of them out of hours. All UK national news outlets use the SMC including the BBC Radio 4 Today Programme, we answer over 800 media enquiries a year, run around 60 press briefings and issue around 120 press releases of comment and facts on the breaking news story of the day.

Despite our work on medicine and health stories, the SMC does not currently get involved in health policy issues,