

Discussion

PROFESSOR J. GOODWIN: Were you able to follow up the patients on whom you operated? Was there any suggestion of recurrence?

PROF. C. DUBOST: Unfortunately the patients come from various countries, and when they have gone back home they cannot easily be checked again.

DR C. J. F. SPRY: I have been following your work for many years and feel that it is an excellent example of how surgery can bring to light important features of a rare disease. It is clear that valve replacement is of great benefit. What is the evidence that endocardectomy improves ventricular function?

PROF. C. DUBOST: We have replaced a valve without resecting the fibrous tissue and this proved unsatisfactory. The fact that patients do well if the fibrous tissue is removed as well means that the basic trouble of the disease is in diastolic function and if you put a valve alone in, the condition is not treated.

DR SPRY: I have heard that surgery not only improves patients rapidly, but also prolongs their survival.

PROF. C. DUBOST: Indeed, one girl who almost died in 1975 is still living although on drugs. There is no sign of recurrence.

DR E. G. J. OLSEN: You were asked whether you put these patients on corticosteroids and you said not. Can I ask you what your postoperative treatment is?

PROF. C. DUBOST: Just the treatment for double valve replacement patients. Antibiotics and digitalis but no specific treatment and no anticoagulants providing the patient remains in sinus rhythm and has no metal valve.

DR OLSEN: It is amazing when a thick endocardial lining is removed, leaving a raw surface, that thrombus does not form and obliterate the whole cavity.

PROF. C. DUBOST: At first the patients were given anticoagulants, but now we have abandoned this.

PROF. J. F. GOODWIN: What valve do you prefer? You have shown several types of valve. Do you have any preference or does it depend on the size of the ventricle?

PROF. C. DUBOST: The mitral valve is very difficult, the aortic is not so difficult. So now our choice is bio-prostheses and Starr valves, each in 50% of cases.

DR SPRY: Which patients with EMF are to be operated on?

PROF. GOODWIN: This is not at all easy. The oversimplified answer would be 'those patients who are not doing well on medical treatment and have appreciable valve regurgitation'. If somebody has a badly leaking valve which is seriously disturbing haemodynamics and producing heart failure, that valve needs to be surgically corrected. That seems to me to be basically the most important indication. It is very difficult to know for certain whether endocardectomy by itself might not achieve quite a lot, but it is very

difficult to prove that it does. The general feeling is that endocardectomy alone does not really achieve very much.

DR DUBOST: I, like you, feel it is not easy to decide, but we have to operate on patients when they reach an advanced stage of cardiac insufficiency due to both mitral valve regurgitation and altered diastolic function. All the cases on which we have operated were high risk cases. I am now sure that pericardectomy is necessary. When, however, the right ventricle is almost entirely filled with a fibrous material and severe cardiac insufficiency is evident, then you can do nothing else but to resect the endocardium.

DR J. J. PUIGBO: I would really be afraid of solving only the problem of the valve, leaving the ventricle in such a poor state. Many other factors could influence surgery. For instance, operation should be performed before pulmonary hypertension has become established. Secondly, we have seen cases with a typical constrictive pattern and I think we have to avoid getting to that stage. We are trying to develop a method to evaluate the degree of restriction of the ventricles in order to establish an index that can be related to the prognosis of the patient. Finally, I think that the ventriculogram or the echocardiogram could form guidelines for surgical intervention.

PROF. GOODWIN: Obviously if you are going to replace a valve and you find that there is a mass of fibrous tissue in the ventricle, you must try and improve its volume because you cannot leave the ventricle grossly restricted. What I was getting at was the situation in which there is not much valve regurgitation, but there is a mass of endocardial thickening without actual obliteration.

DR PUIGBO: If you have a plateau and dip on the left side you must resect.

PROF. GOODWIN: I would agree with that.

DR SPRY: A special surgical problem in patients with eosinophilic endomyocardial disease is the presence of clot in one or both ventricles, and a hypercoagulable state. This has led to postoperative problems in two patients I have heard about. It suggests that particular care should be taken, in these patients, to prevent clots being released, and they should have excellent anticoagulant control. This problem does not seem to have arisen in the tropical form of the disease.

DR P. J. RICHARDSON: I think Professor Bertrand said he was rather against operating at a time when there was a very marked hypereosinophilia, possibly because of this problem. Would you therefore suggest that one should suppress the hypereosinophilia?

DR SPRY: When the eosinophilia is due to a parasitic disease, this ought to be treated. A high eosinophil count by itself need not be a contraindication to surgery, in my view. Anticoagulation control is very difficult in poor communities, but fortunately it is seldom needed by patients with tropical endomyocardial disease.