Heart Check

As with other muscles in the body, there is potential for the disease process in muscular dystrophy to affect the heart. This is important for certain types of muscular dystrophy including Duchenne, Becker, Emery-Dreifuss and myotonic dystrophy. In most patients involvement of the cardiac muscle will be slight as to cause no symptoms at all and no action may be necessary. However, in a few patients involvement of the heart may need treatment.

The heart can be affected in one of two ways:
1) The conduction tissue may be damaged, resulting in abnormal heart rhythms. These can lead to symptoms such as dizzy spells, palpitations or blackouts. The diagnosis can usually be made with a 24 hour ECG. Fast rhythms can be treated and prevented, in susceptible individuals, with drug therapy. Slow rhythms are usually caused by a heart block and treatment may require insertion of a pacemaker (a minor operation carried out under local anaesthetic). A heart block means that the heart’s system for regulating the speed of the heartbeat degenerates. This can cause the heart to beat very slowly, causing blackouts. Patients with myotonic dystrophy and Emery-Dreifuss dystrophy are more prone to develop this sort of problem and should be under regular hospital review.

2) There may be a problem with the pumping action of the heart, called a cardiomyopathy. Symptoms such breathlessness may occur. Cardiomyopathies are more likely to affect people with Duchenne or Becker MD. Those with Duchenne are, to a certain extent, protected by the lack of mobility and the cardiomyopathy will often be mild and without symptoms so treatments is rarely required. On the other hand, patients with Becker MD may develop a moderate to severe cardiomyopathy even when they are still physically active and mobile.

The diagnosis is made by a simple ultrasound examination of the heart called an echocardiogram, which may be repeated to monitor the effects of treatment and progress of the disease. Drug treatment is given to improve the heart’s pumping action.

In patients with a cardiomyopathy from other causes there is now good evidence to show that early treatment improves the long-term outcome. The same may be true for these types of neuromuscular conditions although this has not yet been proven.

What can you do?
- If you are a patient with any of these conditions, it is important that you are receiving regular hospital follow-up, even if you feel well.
- Don’t smoke. Smoking is known to cause cardiovascular disease, which is likely to worsen the effects of the dystrophy.
• Keep your weight down and eat a healthy diet, low in fat and cholesterol. If you are mobile take regular gentle /moderate exercise.

• Report any unusual symptoms such as breathlessness, palpitations, chest pain or dizzy spells to your doctor.