SURVIVAL IN OCTOGENARIANS UNDERGOING CARDIAC RESYNCHRONIZATION THERAPY COMPARED TO THE GENERAL POPULATION

ACC Poster Contributions
Ernest N. Morial Convention Center, Hall F
Monday, April 04, 2011, 9:30 a.m.-10:45 a.m.

Session Title: Predictors of Long Term Outcomes in CRT
Abstract Category: 28. Cardiac Pacing
Session-Poster Board Number: 1089-420

Authors: Jack Rickard, Rayan Yousefzai, David O. Martin, Richard A. Grimm, Dan Sraow, Bruce A. Lindsay, Bruce L. Wilkoff, Mina K. Chung, Patrick Tchou, Cleveland Clinic, Cleveland, OH

Background: According to current selection criteria, many patients eligible for cardiac resynchronization therapy (CRT) are elderly often over 80 years of age. Survival in this population and how it compares to the general octogenarian population is not well established.

Methods: We extracted clinical data on a cohort of 800 consecutive patients undergoing the new implantation of a CRT device between 4/15/2004 and 8/6/2007. Patients over the age of 80, with class II-IV NYHA heart failure symptoms on optimal medical therapy undergoing initial CRT implantation were included in the final cohort. Using the US social security period life table for 2006, fractional survival for octogenarians in the general population was calculated matched to our cohort based on age and gender. A graphical comparison was then made between octogenarians with and without CRT.

Results: 98 octogenarians who met other inclusion criteria were identified. Over a mean follow up of 3.6±1.5 years, there were 47 deaths (48.0%). The mean survival time was 4.1 years (95% CI 3.7-4.5). Compared to the general population, octogenarians receiving CRT had only mildly increased all cause mortality starting at around 2 years post CRT implant.

Conclusions: Octogenarians with heart failure have a reasonable mean survival time following CRT. All cause mortality in this patient population is only mildly increased compared to the general population. Therefore, octogenarians should not be denied CRT based on age alone.