PROCEDURES PERFORMED:,1. DDDR permanent pacemaker.,2. Insertion of a steroid-eluting screw in right atrial lead.,3. Insertion of a steroid-eluting screw in right ventricular apical lead.,4. Pulse generator insertion, model Sigma.,SITE: , Left subclavian vein access.,INDICATION: , The patient is a 73-year-old African-American female with symptomatic bradycardia and chronotropic incompetence with recurrent heart failure and symptoms of hypoperfusion, and for a Class 2a indication for a permanent pacemaker was ascertained.,COMPLICATIONS:, None.,ESTIMATED BLOOD LOSS: , Minimal.,Risks, benefits, and alternatives of the procedure were all explained in detail to the patient and the patient's family at length. They all consented for the procedure, and the consent was signed and placed on the chart.,PROCEDURE: , The patient was taken to cardiac cath lab where she was monitored throughout all procedure. The area of the left pectoral deltoid and subclavian area was sterilely prepped and draped in the usual manner. We also scrubbed for approximately eight minutes. Using lidocaine with epinephrine, the area of the left pectoral deltoid region and subclavian area was then fully anesthetized. Using an #18 gauge Cook needle, the left subclavian vein was cannulated at two separate sites without difficulty, where two separate guidewires were inserted into the left subclavian vein. The Cook needles were removed. Then the guidewires were secured in place with hemostat. Using a #10 and #15 scalpel blade, a 5 cm horizontal incision was made in the left pectodeltoid groove, where the skin was dissected and

blunted on to the pectoralis major muscle. The skin was then undermined making a pocket for the generator. The guidewires were then tunneled through the performed pocket. Subsequently, the atrial and ventricular leads were inserted through each one of the Cordis separately and respectively. Initially, the ventricular lead was inserted, where a Cordis sheath was placed and the guidewire was removed. After the thresholds and appropriate position was obtained for the ventricular lead, the Cordis sheath was then inserted for the atrial lead. After the atrial lead was inserted and appropriately placed and thresholds were obtained, the Cordis was removed and then both leads were sutured in place with pectoralis major muscle with #1-0 silk suture. The leads were then connected to a pulse generator. The pocket was then irrigated and cleansed, where then the leads and the generators were inserted into that pocket. The subcutaneous tissue was then closed with gut sutures and the skin was then closed with #4-0 polychrome sutures using a subcuticular uninterrupted technique. The area was then cleansed and dry. Steri-Strips and pressure dressing were applied. The patient tolerated the procedure well. There were no complications.,Information on the pacemaker:,The implanted device are as follows:,PULSE GENERATOR,Model Name: Sigma.,Model #: SDR203.,Serial #: 123456.,ATRIAL LEAD,Model #: 4568-45 cm.,Serial #: 123456.,RIGHT VENTRICULAR APICAL STEROID-eluting SCREW IN LEAD:,Model #: 4068-52 cm.,Serial #: 123456.,STIMULATION THRESHOLDS ARE AS

FOLLOWS:,The right atrial chamber polarity is bipolar, pulse width is 0.50 milliseconds, 1.5 volts of voltage, 3.7 milliamps of current, 557 ohms of impedance, and P-wave sensing of 3.3 millivolts.,The right ventricular polarity is bipolar, pulse width is 0.50 milliseconds, 0.7 volts of voltage, 1.4 milliamps of current, impedance of 700 ohms, and R-wave sensing of 14 millivolts.,The brady parameter settings were set as follows:,The atrial and ventricular appendages were set at 3.5 volts with 0.4 milliseconds of pulse width, atrial sensitivity of 0.5 with 180 milliseconds of blanking. Ventricular sensitivity was set at 2.8 with 28 milliseconds of blanking. The pacing mode was DDDR, mode switch was on lower rate of 70 and upper rate of 130.,The patient tolerated the procedure well. There were no complications. The patient went to Recovery in satisfactory condition. Family was updated. Orders are all in the chart. Please see orders.,Again, thank you for allowing to participate in this care.