Cardiovascular disease (CVD) accounts for most of the deaths in chronic renal failure (CRF). The purpose of this study was to profile the Echocardiographic (ECHO) and Electrocardiographic (ECG) abnormalities in CRF patients in Benin City.

**METHODS:** Chronic renal failure (CRF) patients were assessed for evidence of cardiovascular disease (CVD) in comparison with 2 equal sets of control populations made up of hypertensive (HBP) patients with normal renal function and normotensive patients (NTC) with normal renal function. ECHO and ECG as well as lipid profiles, serum albumin and packed cell volume (PCV) were assessed on the study population.

**RESULTS:** The subjects were comparable in terms of age, weight and height (P>0.05) being 46.8yrs, 67.8kg and 1.67m for CRF, 46.4yrs, 66.7kg and 1.68m for HBP, and 43.3yrs, 69.1kg and 1.69m for the NTC respectively.

Arrhythmias were prevalent in 46.7% in CRF compared to 20% and 3.3% in the HBP and NTC group respectively (P < 0.05). QTC prolongation was observed in the ratio of 46.7%, 20% and 3.3% in the patient with CRF, HBP and NTC respectively (P<0.05) ECG LVH was 51.7%, 41.7% and 8.3% (P<0.05) in the groups respectively. ECHO LVH was 78.3%, 65% and 1.7% (P< 0.05) in the groups respectively. LV mass was 695.6g 436.1g and 169.0g respectively (P<0.05). Mean total cholesterol was 234.7mg/dl 181.5mg/dl and 148.1mg/dl respectively. The CRF group tended to have more cases of anaemia and hypoalbuminaemia. Mean packed cell volume (PCV) being 23.1%, 38.1% and 37.8% (P<0.05) respectively and mean serum albumin 2.86mg/dl, 3.85mg/dl and 3.88mg/dl (P<0.05) respectively.

**CONCLUSION:** CRF patients have a high prevalence of CVD and it would be worthwhile screening all CRF patients for the disease to make early intervention possible.