## ARIC MANUSCRIPT PROPOSAL FORM

## Manuscript #570

1. Full Title: Physical Activity and Risk of Breast Cancer in Post-menopausal women Abbreviated title (length 26): Exercise and Breast Cancer

2. Writing Group (list individual with lead responsibility first):

Lead: Derek Moore

Address: University of Minnesota Division of Epidemiology

1300 South Second Street, Suite 300

Minneapolis, MN 55454-1015

Phone: (612) 626-8573 Fax: (612) 624-0315

Email Address: moore\_d@epivax.epi.umn.edu

Eyal Shahar Wayne Rosamond Aaron R. Folsom J. Nieto (?) Anthony Ahlberg

3. Timeline (anticipated completion dates):

Data analysis 10/98 Ms. prep. 1/99

## 4. Rationale:

Low physical activity has been hypothesized to be a modifiable risk factor for breast cancer. Stronger associations have been observed in case-control versus cohort studies, and among premenopausal versus post-menopausal women. Data from cohort studies which can assess dose-response are lacking.

## 5. Main Hypothesis:

Physical activity is associated inversely with risk of breast cancer among postmenopausal women.

6. Data (variables, time window, source, inclusions / exclusions): Incident breast cancer cases are identified as part of the ARIC Ancillary Cancer Study. V1 values of physical activity (occupational, sport, and leisure), age, race, education, weight, height, BMI, weight at age 25 ,WHR, ages at menarche and menopause, type of menopause, exogenous estrogen use, total energy and dietary fat intake, alcohol, smoking, parity. V3 values of physical activity.

AMHA form: values of age at first birth, mammography, lactation history, family history

of breast cancer.

Study design: prospective cohort study Analysis: proportional hazards regression

Inclusions: females, post-menopausal, no self-reported history of cancer at V1.