Department:UAMS Human Research Advisory CommitteePolicy Number:14.1Section:Recruitment PracticesEffective Date:July 31, 2002Revision Date:October 10, 2002

Subject: Selection of Subjects

Overview: The requirement for an equitable selection of subjects helps ensure that the burdens and benefits of research will be fairly distributed. When the National Commission for the Protection of Human Subjects recommended that the HRAC be required to make this determination, they noted that questions of equity have only recently been associated with scientific research. In the 19th and early 20th centuries, the burdens of research fell largely upon poor patients in hospital wards, while the benefits flowed primarily to private patients. This inequity was starkly revealed in the Tuskegee syphilis study, in which disadvantaged blacks in the rural south were recruited for studies of the untreated course of a disease that was by no means confined to that population. Such unjustified over utilization of certain segments of the population led the National Commission to recommend that selection of research subjects be scrutinized to determine "whether some classes (e.g., welfare patients, racial and ethnic minorities, or persons confined to institutions) are being systematically selected simply because of their easy availability, their compromised position or their manipulability, rather than for reasons directly related to the problem being studied."

Easy availability, compromised position, and susceptibility to manipulation often overlap. For example, psychology students are readily available for psychological research, medical students are readily available for medical research, prisoners, patients in mental institutions, and military personnel are readily available for a variety of research activities, and employees of drug manufacturing companies are readily available for pharmaceutical research. Subjects selected from these populations are also compromised to the extent that their jobs, promotions, grades, etc., are dependent upon those who might be recruiting them for research. This circumstance makes them susceptible to manipulation.

Patients may also be susceptible to real or imaginary pressure to participate. If an investigator also serves as a patient's primary physician, he or she may feel obliged to participate in the research out of a desire to please, gratitude, or fear that failure to do so will result in hostility or abandonment. Patients who are dependent upon a particular facility for their care (*e.g.*, Veterans Hospitals, Indian Health Service Hospitals, or community health clinics) may feel that they will be treated less well or with less favor if they refuse to participate in research.

With these caveats in mind, investigators and the HRAC must be careful not to *overprotect* vulnerable populations so that they are excluded from participating in research in which they wish to participate, particularly where the research involves therapies for conditions with no available treatments (such as HIV). So too, patients with serious or poorly understood disorders may want to participate frequently in research designed to provide a better understanding of their condition. The fact that the subject may be either a patient of the principal investigator or a patient in the clinic or hospital where the investigator conducts the research should not preclude them from the opportunity to choose to participate as often as they wish.

Just as the inclusion of disproportionate numbers of racial or ethnic minorities in research studies might overburden these groups without affording them the benefits that will result from the research, so will under representation of these groups in study populations ensure that they will not benefit from the research. The National Institutes of Health (NIH) requires that its research grantees include minorities and women in study populations "so that the research findings can be of benefit to all persons at risk of the disease, disorder, or condition under study." If a proposed project includes a study population in which women and minorities are not appropriately represented, the investigator must provide "a clear compelling rationale for their exclusion or inadequate representation" [Application for PHS Grants, form PHS 398, pp. 21-22, and NIH Requests for Proposals (RFPs)]. See HRAC <u>policy 17.6</u> and <u>policy 17.8</u> for further discussion of this issue.

Evaluation Process of Protocols Regarding Equitable Selection of Subjects:

- 1. Will the burdens of participating in the research fall on those most likely to benefit from the research?
- 2. Will the solicitation of subjects avoid placing a disproportionate share of the burdens of research on any single group?
- 3. Does the nature of the research require or justify using the proposed subject population?
- 4. Are there any groups of people who might be more susceptible to the risks presented by the study and who therefore ought to be excluded from the research? Are the procedures for identifying such individuals adequate?
- 5. To the extent that benefits to the subjects are anticipated, are they distributed fairly? Do other groups of potential subjects have a greater need to receive any of the anticipated benefits?
- 6. To the extent that participation in the study is burdensome, are these burdens distributed fairly? Is the proposed subject population already so burdened that it would be unfair to ask them to accept an extra burden?
- 7. Will any special physiological, psychological, or social characteristics of the subject group pose special risks for them?
- 8. Would it be possible to conduct the study with other, less vulnerable subjects? What additional expense or inconvenience would that entail? Does the convenience of the researcher or possible improvement in the quality of the research justify the involvement of subjects who may either be susceptible to pressure or who are already burdened?
- 9. Has the selection process *overprotected* potential subjects who are considered vulnerable (*e.g.*, children, cognitively impaired, economically or educationally disadvantaged persons, patients of researchers, seriously ill persons) so that they are denied opportunities to participate in research?
- 10. If the subjects are susceptible to pressures, are there mechanisms that might be used to reduce the pressures or minimize their impact?

NIH requires the use of a prospective screening and enrollment log to verify appropriate subject selection. Most clinical trials do the same. The ICH guidelines consider a screening and enrollment log and essential document. For these reasons, the HRAC recommends that prospective screening logs be maintained for all research activities that involves a written informed consent document.