

# Miami Selenium for heart & immune health trial

<b>Submission date</b> 13/06/2006	<b>Recruitment status</b> No longer recruiting	<input type="checkbox"/> Prospectively registered
<b>Registration date</b> 03/07/2006	<b>Overall study status</b> Completed	<input type="checkbox"/> Protocol
<b>Last Edited</b> 16/08/2011	<b>Condition category</b> Infections and Infestations	<input type="checkbox"/> Statistical analysis plan
		<input checked="" type="checkbox"/> Results
		<input type="checkbox"/> Individual participant data

## Plain English summary of protocol

Not provided at time of registration

## Contact information

### Type(s)

Scientific

### Contact name

Dr Barry Hurwitz

### Contact details

Behavioral Medicine Reaserch Center (200 BMRC)  
c/o VA Medical Center  
1201 NW 16 Street  
Miami  
United States of America  
33125  
+1 305 575 7161  
bhurwitz@miami.edu

## Additional identifiers

### Protocol serial number

RO1 DA13128

## Study information

### Scientific Title

### Acronym

MIASEL

**Study objectives**

The primary aim of this project is to examine whether selenium supplementation in cocaine-abusing and non-substance-abusing Human Immunodeficiency Virus (HIV) infected persons will diminish oxidative stress and improve immune function, insulin sensitivity, cardiac and vascular function, and indices of Cardiovascular Disease (CVD) risk. The secondary aim of this project is to determine whether oxidative stress, insulin sensitivity, and immune and cardiovascular function are potential mediating mechanisms for selenium effects on the measures of CVD risk.

**Ethics approval required**

Old ethics approval format

**Ethics approval(s)**

3/23/2001; 5/15/2002; 4/14/2003; 3/8/2004; 3/29/2005; 1/18/2006 WIRB PRNo:20060171  
All dates except the last pertain to University of Miami Institutional Review Board. Due to institutional difficulties, the protocol was then outsourced by the University of Miami to the Western Institutional Review Board.

**Study design**

Two group randomised double-blind placebo-controlled study

**Primary study design**

Interventional

**Study type(s)**

Treatment

**Health condition(s) or problem(s) studied**

Human Immunodeficiency Virus (HIV)

**Interventions**

Selenium supplement (200 ug/day) versus placebo

**Intervention Type**

Drug

**Phase**

Not Specified

**Drug/device/biological/vaccine name(s)**

Selenium

**Primary outcome(s)**

HIV viral load, CD4 count, metabolic syndrome, cardiac contractility, cardiac compliance, cardiac mass

**Key secondary outcome(s))**

Oxidative stress, inflammation

**Completion date**

30/06/2006

# Eligibility

## Key inclusion criteria

1. Participants provided informed consent
2. Presented documented evidence of their HIV-1 infection
3. Were 18 to 55 years of age
4. Were not being treated pharmacologically for a diagnosed cardiovascular condition (e.g., beta-blockers, calcium antagonists, Angiotensin-Converting Enzyme [ACE] inhibitors), for carbohydrate conditions (e.g., hypoglycemics, insulin sensitizers), for psychiatric conditions (e.g., antipsychotics, antidepressives), and for endocrine conditions (e.g., estrogen hormonal replacement)
5. Presented no evidence of myocardial infarction or Atrio-Ventricular (AV) conduction arrhythmias upon electrocardiogram
6. Had no history of diabetes or cardiovascular disorder, or other major systemic diagnosis unrelated to HIV spectrum disease
7. Had no gross neurocognitive dysfunction indicated by a Folstein Mini-Mental Status Exam (MMSE) score < 26
8. Did not have a recent acute infection or surgery within three months of study entry
9. Were premenopausal and not pregnant with no intent to become pregnant
10. Were not participating in another blinded clinical trial
11. Refused to discontinue use of a nutritive supplement that contained > 50 ug per pill
12. Had a serum selenium level upon screen equal or superior to 75 ug/l.

Participants meeting these criteria signed an informed consent form for screening and if still eligible additional written consent was obtained for randomization into the trial.

## Participant type(s)

Patient

## Healthy volunteers allowed

No

## Age group

Adult

## Lower age limit

18 years

## Sex

All

## Key exclusion criteria

1. Participating in another blinded clinical trial
2. Being treated pharmacologically (e.g., beta-blockers, calcium antagonists, ace inhibitors) for diagnosed cardiovascular function
3. Pregnant or have the intent to become pregnant
4. Post-menopausal women
5. Presenting an electrocardiogram (ECG) arrhythmia in which the proposed cardiovascular assessments would be contraindicated
6. Taking any medications that have contraindicating cardiovascular effects (i.e., tricyclic anti-

depressant medications, etc.)

7. Displaying gross neurocognitive dysfunction indicated by a Folstein Mini-Mental Status Exam (MMSE) score equal or superior to 26

**Date of first enrolment**

23/03/2001

**Date of final enrolment**

30/06/2006

## Locations

**Countries of recruitment**

United States of America

**Study participating centre**

**Behavioral Medicine Research Center (200 BMRC)**

Miami

United States of America

33125

## Sponsor information

**Organisation**

National Institute on Drug Abuse (USA)

**ROR**

<https://ror.org/00fq5cm18>

## Funder(s)

**Funder type**

Government

**Funder Name**

National Institute on Drug Abuse (USA)

**Alternative Name(s)**

The National Institute on Drug Abuse, NIH National Institute on Drug Abuse, Instituto Nacional sobre el Abuso de Drogas, Instituto Nacional sobre el Abuso de Drogas de Estados Unidos, NIDA

**Funding Body Type**

Government organisation

**Funding Body Subtype**

National government

**Location**

United States of America

## Results and Publications

**Individual participant data (IPD) sharing plan**

**IPD sharing plan summary**

**Study outputs**

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
<a href="#">Results article</a>	Results	22/01/2007		Yes	No