

## Scientific Program Themes

### Cancer Control and Population Health Sciences (CCPHS)

- Determination and evaluation of **risk factors** contributing to development of cancer
- Evaluation and development of **cancer screening strategies for early detection**
- Assessment of **access to high-quality cancer care** and prevention resources
- Investigation and improvement of **health-related outcomes and quality of life** for cancer patients

### Host Factors and Tumor Progression (HFTP)

- **Influence of Tumor Tissue Microenvironment** on cell-cell interactions, cell structure, migration, angiogenesis, EMT and metastatic bone disease
- **Biomarkers and Targeted Therapies** - discovery and development of diagnostics and cancer intervention for prevention of progression
- **Coagulation - role of platelets and tumor cell crosstalk**, a broad spectrum of effects
- **Genes and Signaling Pathways** - discovery of novel targets

### Molecular Mechanisms of Malignancy (MMM)

- **DNA damage, mutagenesis and repair, genome instability**
- **Cancer cell biology** (stem cells, cell differentiation, division and motility).
- **Gene regulation** including epigenetics and epigenomics
- **Redox homeostasis**