NIH Early-Onset Colorectal Cancer (EO-CRC) Think Tank

Supported by
National Cancer Institute (NCI) & National Institute of Environmental Health Sciences (NIEHS)

September 24–25, 2020

AGENDA – VIRTUAL MEETING

Website: https://events.cancer.gov/crs/eocrc

Thursday, September 24th
(This portion of the meeting will be conducted using Zoom Webinar)

10:00-10:15 Opening Remarks
   • Introduction: L. Michelle Bennett, PhD, Director, NCI Center for Research Strategy
   • Welcome: Douglas R. Lowy, MD, NCI Principal Deputy Director
   • Goals of the Meeting: James V. Tricoli, PhD, Chief, Diagnostic Biomarkers and Technology Branch, Division of Cancer Treatment and Diagnosis (DCTD), NCI

10:15-12:00 Session 1: How can observational studies enhance the understanding of early-onset colorectal cancer?

Moderators: Kathy Helzlsouer, MD, MHS, and Stefanie Nelson, PhD, Division of Cancer Control and Population Sciences (DCCPS), NCI

20 min Topic Introduction: What is known about current patterns and trends in incidence and mortality? Rebecca Siegel, MPH, American Cancer Society

15 min Re-evaluation of putative risk factors and precursors: Yin Cao, ScD, MPH, Washington University in St. Louis

15 min Earlier life exposures: maternal obesity and gestational growth: Caitlin Murphy, PhD, University of Texas Southwestern Medical Center

15 min Diet, the gut microbiome, and early-onset colorectal cancer: Andrew T. Chan, MD, MPH, Massachusetts General Hospital and Harvard Medical School

30 min Panel Q&A

12:00-12:30 Break
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<th>Time</th>
<th>Session</th>
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<td>12:30-2:15</td>
<td><strong>Session 2: What putative exposures or factors are contributing to the rising incidence of early-onset colorectal cancer?</strong>&lt;br&gt;<em>Moderators: Arun Pandiri, PhD, National Toxicology Program, NIEHS, and Sharon Ross, PhD, MPH, Division of Cancer Prevention (DCP), NCI</em></td>
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<td>20 min</td>
<td>Topic Introduction: What is known about etiological factors? Rick Woychik, PhD, NIEHS</td>
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<td>15 min</td>
<td>Obesity, metabolic &amp; inflammatory disease contributions to EO-CRC: Nathan A. Berger, MD, Case Comprehensive Cancer Center, Case Western Reserve University School of Medicine</td>
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<td>15 min</td>
<td>Dietary and environmental exposures: Stephen Baylin, MD, Johns Hopkins University School of Medicine</td>
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<td>15 min</td>
<td>Microbiome interactions: Cynthia L. Sears, MD, Johns Hopkins University School of Medicine</td>
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<td>30 min</td>
<td>Panel Q&amp;A</td>
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<td>2:15-2:20</td>
<td><strong>Break</strong></td>
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<td>2:20-4:05</td>
<td><strong>Session 3: What are the potential biological mechanisms underlying early-onset colorectal cancer?</strong>&lt;br&gt;<em>Moderators: Phillip Daschner, MS, Division of Cancer Biology and James Tricoli, PhD, DCTD, NCI</em></td>
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<tr>
<td>20 min</td>
<td>Topic Introduction: What is known about biological mechanisms: Kimmie Ng, MD, MPH, Dana-Farber Cancer Institute</td>
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<td>15 min</td>
<td>Molecular characterization of early-onset colorectal cancer: David Shibata, MD, FACS, University of Tennessee Heath Science Center</td>
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<td>15 min</td>
<td>Molecular signatures of EO-CRC: C. Richard Boland, MD, University of California, San Diego School of Medicine</td>
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<td>15 min</td>
<td>Pathology of disease: Lisa Boardman, MD, Mayo Clinic Rochester</td>
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<td>30 min</td>
<td>Panel Q&amp;A</td>
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<td>4:05-4:15</td>
<td><strong>Day 1 Closing Remarks and Announcements</strong></td>
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<td>Laura Lunardi, PhD, NCI</td>
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**Friday, September 25th**

(This portion of the meeting will be conducted using Zoom Webinar.)

10:00-10:05  **Opening Remarks for Day 2**  
Phillip Daschner, MS, NCI

10:05-10:20  **Patient Advocacy Remarks**  
Andrea Dwyer  
Fight CRC/National Colorectal Cancer Roundtable

10:20-12:05  **Session 4: Possibilities for early-onset CRC screening and prevention**  
*Moderators: Asad Umar, PhD, DVM, and Matthew Young, PhD, DCP, NCI*

- 15 min  
Knowns and unknowns about screening for early-onset colorectal cancer: **Sonia Kupfer, MD, University of Chicago**

- 15 min  
Utility of Mt-sDNA for detection and screening for EO-CRC: **Thomas Imperiale, MD, Indiana University**

- 15 min  
Using FDA-approved screening modalities for EO-CRC (~45 age group to FDA): **Graham Lidgard, PhD, Exact Sciences**

- 20 min  
Early-onset colorectal cancer: possibilities for screening and prevention: **John Baron, MD, MS, MSc, Geisel School of Medicine at Dartmouth**

- 30 min  
Panel Q&A

12:05-12:35  **Break**

12:35-2:20  **Session 5: Translational opportunities and clinical experiences**  
*Moderators: Anil Wali, PhD, Center to Reduce Cancer Health Disparities and Steven Nothwehr, PhD, DCTD, NCI*

- 20 min  
Topic Introduction: **John Carpten, PhD, University of Southern California**

- 15 min  
Epigenetic dysregulation in early-onset colorectal cancer: **Nathan A. Ellis, PhD, University of Arizona Cancer Center**

- 15 min  
Molecular aspects of EO-CRC and clinical experience: **Scott Kopetz, MD, PhD, MD Anderson Cancer Center**

- 15 min  
Personalized screening for EO-CRC: initial experience and future directions: **Jeffrey K. Lee, MD, MPH, Kaiser Permanente Northern California Division of Research**

- 30 min  
Panel Q&A
2:20  Day 2 Scientific Sessions Closing Remarks and Announcements
Laura Lunardi, PhD, NCI

2:20-2:40  Break

2:40-4:15  Breakout Groups and Wrap-Up

(This portion of the meeting will be conducted using Zoom Meeting. Prior registration required.)

5 min  Opening Remarks: Laura Lunardi, PhD, Center for Research Strategy, NCI

60 min  Breakout Group Discussions:

- **Group 1**: Role of Obesity, diet, & environmental factors in EO-CRC  
  *Moderators: Somdat Mahabir, PhD, MPH, and Sharon Ross, PhD, MPH*

- **Group 2**: Role of microbiota & infectious agents in EO-CRC  
  *Moderators: Tram Kim Lam, PhD, MPH, and Roberto Flores, PhD, MS, MPH*

- **Group 3**: Are there distinct molecular features of EO-CRC?  
  *Moderators: Stefanie Nelson, PhD, and Phillip Daschner, MS*

- **Group 4**: Possible screening and prevention strategies to reduce EO-CRC burden  
  *Moderators: Mathew Young, PhD, and Asad Umar, PhD, DVM*

- **Group 5**: Possible treatment modalities for EO-CRC  
  *Moderator: Carmen Allegra, MD*

25 min  Report Out (2-3 min per Breakout Group)

5 min  Wrap-Up and Closing Remarks: Laura Lunardi, PhD