

# **Canadian Multi-Messenger Astrophysics Workshop**

## **Report of Contributions**

Contribution ID : 1

Type : **not specified**

## **Welcome address, territorial acknowledgement, code of conduct**

Daryl Haggard, Thomas Brunner, Sangyong Jeon

**Session Classification :** Breakfast

Contribution ID : 2

Type : **not specified**

## **Gravitational-Wave Sources and Detection**

*Wednesday, 29 January 2020 09:15 (30)*

Miriam Cabero Muller (UBC)

**Primary author(s)** : MULLER, Miriam Cabero (University of British Columbia)

**Presenter(s)** : MULLER, Miriam Cabero (University of British Columbia)

**Session Classification** : Talks

Contribution ID : 3

Type : **not specified**

## **Double White Dwarf Binaries as Multi-Messenger Sources**

*Wednesday, 29 January 2020 14:00 (20)*

Katelyn Breivik (CITA)

**Primary author(s)** : BREIVIK, Katelyn (Canadian Institute for Theoretical Astrophysics)

**Presenter(s)** : BREIVIK, Katelyn (Canadian Institute for Theoretical Astrophysics)

**Session Classification** : Talks

Contribution ID : 4

Type : **not specified**

## **Multimessenger transient theory in Canada**

*Wednesday, 29 January 2020 09:45 (20)*

Rodrigo Fernández (U of Alberta)

**Primary author(s)** : FERNÁNDEZ, Rodrigo (University of Alberta)

**Presenter(s)** : FERNÁNDEZ, Rodrigo (University of Alberta)

**Session Classification** : Talks

Contribution ID : 5

Type : **not specified**

## **Optical Imaging Follow-up of GW190814: the First Possible Black Hole - Neutron Star Merger**

*Wednesday, 29 January 2020 15:50 (20)*

Nicholas Vieira (McGill)

**Primary author(s)** : VIEIRA, Nicholas (McGill University)

**Presenter(s)** : VIEIRA, Nicholas (McGill University)

**Session Classification** : Talks

Contribution ID : 6

Type : **not specified**

# Hunting High-Energy Counterparts to Gravitational Wave Events

*Wednesday, 29 January 2020 14:20 (20)*

Aaron Tohuvavohu (U of T)

**Primary author(s) :** TOHUVAVOHU, Aaron (University of Toronto)

**Presenter(s) :** TOHUVAVOHU, Aaron (University of Toronto)

**Session Classification :** Talks

Contribution ID : 8

Type : **not specified**

## **X-ray Observations of GW170817: the First Binary Neutron Star Merger**

*Wednesday, 29 January 2020 14:40 (20)*

Daryl Haggard (McGill)

**Primary author(s)** : HAGGARD, Daryl (McGill University)

**Presenter(s)** : HAGGARD, Daryl (McGill University)

**Session Classification** : Talks

Contribution ID : 9

Type : **not specified**

## **Canadian Radio Follow-up of Multi-Messenger Sources and High-Energy Neutrinos**

*Wednesday, 29 January 2020 11:30 (30)*

Greg Sivakoff (U of Alberta)

**Primary author(s)** : SIVAKOFF, Greg (University of Alberta)

**Presenter(s)** : SIVAKOFF, Greg (University of Alberta)

**Session Classification** : Talks

Contribution ID : **10**

Type : **not specified**

## **Orbital Effects in Perturbations around Exotic Compact Objects**

*Thursday, 30 January 2020 16:00 (20)*

Luis Felipe Longo-Micchi (UFABC - PI)

**Primary author(s)** : MICCHI, Luis Felipe Longo (UFABC - Perimeter Institute)

**Presenter(s)** : MICCHI, Luis Felipe Longo (UFABC - Perimeter Institute)

**Session Classification** : Talks

Contribution ID : 11

Type : **not specified**

## **Current and Future Canadian optical/infrared Opportunities for Multi-Messenger Follow-up**

*Wednesday, 29 January 2020 15:30 (20)*

John Ruan (McGill)

**Primary author(s)** : RUAN, John (McGill University)

**Presenter(s)** : RUAN, John (McGill University)

**Session Classification** : Talks

Contribution ID : 12

Type : **not specified**

## **Probing Core-Collapse Supernova Physics in the Multi-Messenger Era**

*Thursday, 30 January 2020 09:00 (20)*

Sarah Gossan (CITA)

**Primary author(s)** : GOSSAN, Sarah (Canadian Institute for Theoretical Astrophysics)

**Presenter(s)** : GOSSAN, Sarah (Canadian Institute for Theoretical Astrophysics)

**Session Classification** : Talks

Contribution ID : 13

Type : **not specified**

## **SuperNova Early Warning System 2.0**

*Thursday, 30 January 2020 09:40 (20)*

Clarence Virtue (Laurentian/SNOLAB)

**Primary author(s)** : VIRTUE, Clarence (Laurentian University - SNOLAB)

**Presenter(s)** : VIRTUE, Clarence (Laurentian University - SNOLAB)

**Session Classification** : Talks

Contribution ID : 14

Type : **not specified**

## **SNO+ and Supernova Detection**

*Thursday, 30 January 2020 10:00 (20)*

Erica Caden (SNOLAB)

**Primary author(s)** : CADEN, Erica (SNOLAB)

**Presenter(s)** : CADEN, Erica (SNOLAB)

**Session Classification** : Talks

Contribution ID : 15

Type : **not specified**

## The P-ONE Neutrino Detector

*Thursday, 30 January 2020 11:30 (20)*

Carsten Krauss (U of Alberta)

**Primary author(s)** : KRAUSS, Carsten (University of Alberta)

**Presenter(s)** : KRAUSS, Carsten (University of Alberta)

**Session Classification** : Talks

Contribution ID : 16

Type : **not specified**

## **Multi-Messenger Observations with VERITAS**

*Thursday, 30 January 2020 14:00 (20)*

Matthew Lundy (McGill)

**Primary author(s)** : LUNDY, Matthew (McGill)

**Presenter(s)** : LUNDY, Matthew (McGill)

**Session Classification** : Talks

Contribution ID : 17

Type : **not specified**

## **Supernova Neutrino Detection with nEXO**

*Thursday, 30 January 2020 14:40 (10)*

Soud Al Kharusi (McGill)

**Primary author(s)** : AL KHARUSI, Soud (McGill University)

**Presenter(s)** : AL KHARUSI, Soud (McGill University)

**Session Classification** : Talks

Contribution ID : **18**

Type : **not specified**

## **Searching for Majorana Neutrinos with nEXO**

*Thursday, 30 January 2020 14:20 (20)*

Thomas Brunner (McGill)

**Primary author(s)** : BRUNNER, Thomas

**Presenter(s)** : BRUNNER, Thomas

**Session Classification** : Talks

Contribution ID : 19

Type : **not specified**

## **New HALO-1kT and Future Prospects of Supernova Neutrino Flux Reconstruction**

*Thursday, 30 January 2020 10:50 (20)*

Andrea Gallo Rosso (Laurentian)

**Primary author(s)** : GALLO ROSSO, Andrea (Laurentian University)

**Presenter(s)** : GALLO ROSSO, Andrea (Laurentian University)

**Session Classification** : Talks

Contribution ID : 21

Type : **not specified**

## **Dark matter direct/indirect detection complementarity**

*Thursday, 30 January 2020 16:20 (20)*

Jim Cline (McGill)

**Primary author(s)** : CLINE, Jim (McGill)

**Presenter(s)** : CLINE, Jim (McGill)

**Session Classification** : Talks

Contribution ID : 22

Type : **not specified**

## **Electromagnetic Observations of Multi-Messenger Sources and r-process Nucleosynthesis**

*Wednesday, 29 January 2020 10:05 (30)*

Maria Drout (U of T)

**Primary author(s)** : DROUT, Maria (University of Toronto)

**Presenter(s)** : DROUT, Maria (University of Toronto)

**Session Classification** : Talks

Contribution ID : 23

Type : **not specified**

## **Nucleosynthesis and Thermal Neutrinos**

*Wednesday, 29 January 2020 11:00 (30)*

Dan Siegel (PI)

**Presenter(s)** : SIEGEL, Daniel (Perimeter Institute for Theoretical Physics)

**Session Classification** : Talks

Contribution ID : 24

Type : **not specified**

## **SNEWS 2.0 implementation for HALO-1kT**

*Thursday, 30 January 2020 11:10 (20)*

Remington Hill (Laurentian)

**Primary author(s)** : HILL, Remington (Laurentian University)

**Presenter(s)** : HILL, Remington (Laurentian University)

**Session Classification** : Talks

Contribution ID : 25

Type : **not specified**

## **Neutrino and Multi-Messenger Signals**

*Thursday, 30 January 2020 09:20 (20)*

Liliana Caballero (U of Guelph)

**Presenter(s)** : CABALLERO, Liliana (University of Guelph)

**Session Classification** : Talks