



**SHERATON PARKWAY, TORONTO NORTH, RICHMOND HILL
OCTOBER 4 – 9, 2009**

SUNDAY, OCTOBER 4, 2009

14:45 – 15:00 Field trip, bus leaves hotel, and returns on Monday, October 5, by 16:30

TUESDAY, OCTOBER 6, 2009

07:45 – 08:30 WORKSHOP REGISTRATION (Markham Room)

08:30 – 16:30 Advanced Diesel Engines and Emission & Control Technologies for Underground Mines

18:00 - 20:00 CONFERENCE PRE-REGISTRATION & NETWORKING (York B & C Foyer)

18:30 – 22:00 EXHIBIT ROOM SET UP (York B & C Foyer)

WEDNESDAY, OCTOBER 7, 2009 (York B, C and Foyer)

07:30 REGISTRATION

08:30 CONFERENCE OPENING CEREMONIES:

Welcome and Introduction, JP Ouellette (Kubota Canada Ltd.), Co-Chair MDEC Conference

Introduction of Keynote Speaker, David Young (Natural Resources Canada), Secretary & Treasurer MDEC

Keynote Address: Business Approach to Mine Air Quality and Ventilation, Michael J. Byrne, Vice President, Health and Safety Loss Prevention, Newmont Mining Corporation

Organization, Mahe Gangal (Natural Resources Canada), Co-Chair MDEC Conference

10:00 COFFEE BREAK

10:30 SESSION 1: BIODIESEL

CHAIRPERSON: Joe Stachulak (Vale Inco)

Evaluation of the impact of using biodiesel fuel in mine production equipment, Brent Rubelj, Steve Hardcastle, and Mahe Gangal (Natural Resources Canada)

Controlling exposure to DPM: Diesel particulate filters vs. biodiesel, Aleksandar D. Bugarski and Xiao-Chun Shi (NIOSH)

The national renewable diesel demonstration initiative (NRDDI), Nancy Johns (Natural Resources Canada)

12:00 LUNCH - introduction of sponsors

13:00 SESSION 2: CONTROL TECHNOLOGIES

CHAIRPERSON: David Young (Natural Resources Canada)

Success through fuel borne catalysts in the mining, *Volker Hensel and Ulrich Lampen (MANN+HUMMEL), Joe Stachulak (Vale Inco), Matthew Vincent (Innospec)*

NO₂ management in diesel exhaust streams, *Joseph Holroyd (Airflow Catalyst Systems)*

Retrofit SCR system for NO_x control from heavy-duty mining equipment, *M.A. Mannan (Nett Technologies Inc.)*

14:30 COFFEE BREAK

15:00 SESSION 3: AMBIENT DPM

CHAIRPERSON: John Blogg (Ontario Mining Association)

An eight year look at diesel particulate matter (DPM) results – Vale Inco Ltd., *Cheryl L. Allen and Doug F. O'Connor (Vale Inco Ltd.)*

Real-time airborne diesel particulate matter monitoring in underground mines, *Michel Grenier and Kevin Butler (Natural Resources Canada), Cheryl Allen (Vale Inco Ltd.), and Gordon Hnatiuk and Charlie Hazen (Xstrata Nickel Sudbury)*

A real-time, wearable elemental carbon monitor for diesel particulate measurements in underground mines, *Larry Takiff (ICx Normadics)*

16:30 ADJOURNMENT

16:30 – 18:30 RECEPTION & NETWORKING (York B & C Foyer)

THURSDAY, OCTOBER 8, 2008 (York B & C Foyer)

08:00 REGISTRATION

08:30 SESSION 4: DIESEL AND MDEC PLENARY CONSULTATION

Keynote Address: Advanced Diesel Engines and the Exhaust Emission Controls,
Presidential Professor John H. Johnson (Michigan Technological University)

Review of last ten years of MDEC, *Edward Richards (LiquidPiston, Inc.)*

Final Plenary Consultation, *Mahe Gangal (Co-Chair MDEC Conference)*

Summary of comments from MDEC 2008

Review of MDEC 2009

Plans for MDEC 2010

Final remarks

10:00 COFFEE BREAK

10:30 SESSION 5: ENGINE AND EMISSIONS**CHAIRPERSON: Edward Richards (LiquidPiston Inc.)**

Soot accumulation in diesel particulate filters using ULSD and B20 biodiesel fuel blends, *Paul Charbonneau and James S. Wallace (University of Toronto)*

Diesel engine development of aluminium alloys for high temperature applications in diesel engines, *W. Kasprzak, D. Emadi and M. Sahoo (CANMET-MTL, Natural Resources Canada)*

Performance evaluation of underground mine diesel engine exhaust insulation products, *John Stekar (Catalytic Exhaust Products Limited)*

12:00 LUNCH - award of draw prizes**13:00 SESSION 6: DPM AND VENTILATION****CHAIRPERSON: JP Ouellette (Kubota Canada Ltd.)**

Partial diesel particulate filters – Practical experiences, *Chris Aniolowski, Paul Turpin, Shazam Williams (DCL International Inc.)*

New chemical tracers for diesel source emission apportionment in ambient fine particulate matter, *JeanPierre Charland, Gianni Caravaggio, Penny MacDonald, and Tony MacPhee (Natural Resources Canada), and Lisa A. Graham (Environment Canada)*

Optimized mine ventilation on demand (OMVOD), *Mark Anderson and Mark Laine (Simsmart Technologies)*

14:30 COFFEE BREAK**15:00 SESSION 7: MDEC 2008 ROUNDTABLE FORUM REVIEW PANEL****Moderator: Michel Grenier (Natural Resources Canada)**

Panellists: Diesel Particulate Filters, *Michel Grenier (NRCan)*
 Fuels, *JP Ouellette (Kubota Canada Ltd.)*
 DPM and NO₂, *Aleksandar Bugarski (NIOSH)*
 Engine and Vehicles, *John Vergunst Ontario Ministry of Labour*

16:30 ADJOURNMENT**FRIDAY, OCTOBER 9, 2009****ROUNDTABLE FORUM**

	Room - Markham A	Room - Aurora
08:30	Diesel Particulate Filters (new technology, evaluation & certification, mines access for testing & development, safety with high temperatures/active regeneration) Facilitator: Aleksandar Bugarski (NIOSH)	Fuels (biodiesel – lower DPM and higher NO_x, additives, low & ultralow sulphur, standards, alternative fuels) Facilitator: Brent Rubeli (NRCan)
10:00	COFFEE BREAK	COFFEE BREAK
10:30	DPM and NO₂ in Mines (DPM monitoring control and regulation, NO₂ reduction, DOCs with NO₂ suppression techniques) Facilitator: Addy Majewski (Ecopoint)	Engines (new tech, suitability of tier 3 & 4 for mines, emission, evaluation & certification, alternative, fuel cell) Facilitator: John Vergunst (Ontario MOL)
12:00	ADJOURNMENT	ADJOURNMENT