

Preliminary (v4*) agenda for MMS Community Workshop

21-24 October 2019, "Le Bellevue" Congress Center in Biarritz (France)

Monday 21 October 2019

Time	Duration	Session
08:00	1h'	REGISTRATION
09:00	1h30'	HPCA team (<i>Vague 1</i>) EPD team (<i>Vague 2</i>) FIELDS team (<i>Vague 3</i>)
10:30	30'	Coffee Break
11:00	1h30'	HPCA team (<i>Vague 1</i>) EPD team (<i>Vague 2</i>) FIELDS team (<i>Vague 3</i>)
12:30	2h'	Lunch time
14:30	1h30'	Senior Review Committee (<i>Rhune 2</i>)
16:00	30'	Coffee Break
16:30	1h30'	MMS SWG (<i>Rhune 2</i>)

*Note that this agenda is not definitive, small changes may still come, stay tuned for updated versions

Tuesday 22 October 2019 (Room: Rhune 2)

Time	Duration	Session	Speaker	Title
09:00	15'	Tail (B. Lavraud)	<i>Justin Holmes</i>	Magnetic compression and nonlinear waves at the reconnection separatrix
09:15	15'		<i>Cecilia Norgren</i>	Electron acceleration and thermalization at magnetotail reconnection separatrices
09:30	15'		<i>Anthony Rogers</i>	Applying Magnetic Curvature to identify thin current sheets relative to tail reconnection regions
09:45	15'		<i>Gabor Toth</i>	Exploring the Dynamics of Sawtooth Oscillations Using the Global Magnetohydrodynamics with Embedded Particle-in-Cell Model
10:00	15'		<i>Giovanni Lapenta</i>	Reconnection outflows in the magnetotail: comparing MMS crossings with HPC PIC simulations
10:15	30'	Coffee Break		
10:45	15'	Tail (C. Norgren)	<i>Olivier Le Contel</i>	MMS/Cluster joint measurements of plasma sheet boundary layer crossings: a case study
11:00	15'		<i>Richard Denton</i>	Measuring the magnetic structure velocity for the 11 July 2017 magnetotail reconnection event
11:15	15'		<i>Sam Bingham</i>	MMS Observations of the Charge Dependent Energization and Drift Trajectory of Ions During Injections in the Earth's Magnetotail
11:30	15'		<i>Evgeny Panov</i>	Broad dipolarization-injection fronts
11:45	15'		<i>Reiner Friedel</i>	Substorm injections as seen by MMS and MANY other satellites
12:00	2h	Lunch time		
14:00	15'	Tail / EDR (R. Kieokaew)	<i>Daniel Baker</i>	Shocks, High Speed Streams, and Sudden Impulses: MMS Studies of Effects on Energetic Particle Properties
14:15	15'		<i>Joseph Fennell</i>	Do ULF Waves Generate Microinjections?
14:30	15'		<i>Jim Burch</i>	Fine Structure of Magnetopause Electron Diffusion Regions
14:45	15'		<i>Kevin Genestreti</i>	Ion-scale structure of the outer electron diffusion region
15:00	15'		<i>Michael Hesse</i>	Revisiting the structure of the electron diffusion region in asymmetric magnetic reconnection
15:15	15'		<i>Wenya Li</i>	Electron diffusion region of magnetic reconnection with ~ 0.10 guide field in the magnetotail
15:30	30'	Coffee Break		
16:00	15'	EDR (S. Toledo-Redondo)	<i>Alexandra Alexandrova</i>	Electron firehose instability operating in the electron diffusion region
16:15	15'		<i>Kyunghwan Dokgo</i>	High-frequency waves driven by agyrotropic electron distribution
16:30	15'		<i>Roy Torbert</i>	Reconstructions and Dynamics in the External EDR
16:45	15'		<i>Martin Goldman</i>	Umbrella model of electron "crescent" velocity distributions
17:00	3h	Poster session		
		Cocktail		

POSTER SESSION (Tuesday 22 October 2019, 17-20h)

<i>Marek Vandas</i>	Models of magnetosheath magnetic field
<i>Vincent Génot</i>	The CDP in the MMS era
<i>Olga Tsareva</i>	Relationship between wave-like auroral arcs and electromagnetic drift waves
<i>Elena Grigorenko</i>	The dynamics of electron anisotropy and its relation to whistler bursts observed at dipolarization fronts by MMS
<i>Natalia Buzulukova</i>	Global and Local Properties of the Reconnection Exhaust: Global Resistive MHD Simulations and MMS Observations
<i>Konrad Steinvall</i>	Observations of Electromagnetic Electron Holes and Evidence of Cherenkov Whistler Emission
<i>Rungployphan Kieokaew</i>	Multi-scale Structure Analyses of Magnetopause Kelvin-Helmholtz Waves: Applications of Four-spacecraft to MHD Simulations and Cluster and MMS Observations
<i>Sid Fadanelli</i>	On the latitude development of the Kelvin-Helmholtz instability and subsequent reconnection at the Earth's magnetospheric flanks
<i>Gabriel Fruit</i>	Destabilization of 2D magnetic current sheets by resonance with bouncing electrons - a new theory
<i>Benoit Lavraud</i>	Who knows what this is?

Wednesday 23 October 2019 (Room: Rhune 2)

Time	Duration	Session	Speaker	Title
09:00	15'	EDR / Turbulence (J. Burch)	<i>Jason Shuster</i>	Kinetic Signatures of Force Balance at the Reconnecting Magnetopause: MMS Observations of Terms in the Ion and Electron Vlasov Equations
09:15	15'		<i>Daniel Graham</i>	Non-Maxwellianity of electron distributions and their source regions
09:30	15'		<i>Jose López-Miralles</i>	Measuring anomalous dissipation effects using a modification of the Wiener-Khinchin theorem.
09:45	15'		<i>Narges Ahmadi</i>	Observations of Kinetic Turbulence associated with Magnetotail Reconnection
10:00	15'		<i>Jiansen HE</i>	Diffusion, Dispersion, and Dissipation of Kinetic Compressible Turbulence: Comparison Between Kinetic Theory and Measurements from MMS
10:15	30'	Coffee Break		
10:45	15'	Turbulence / Flank (S. Fadanelli)	<i>Yuri Khotyaintsev</i>	Electron Heating by Debye-Scale Turbulence in Guide-Field Reconnection
11:00	15'		<i>Robert Ergun</i>	Particle Acceleration by Strong Turbulence Associated with Magnetic Reconnection
11:15	15'		<i>Julia E. Stawarz</i>	Turbulence-Driven Magnetic Reconnection: A Survey of Magnetosheath Turbulence Observed by MMS
11:30	15'		<i>Hiroshi Hasegawa</i>	Generation of turbulence in Kelvin-Helmholtz vortices at the Earth's magnetopause
11:45	15'		<i>Rungployphan Kleokaew</i>	Observations of Magnetic Reconnection inside a Flux Transfer Event in Magnetopause Kelvin-Helmholtz Waves
12:00	2h	Lunch time		
14:00	15'	Flank / magnetosheath / Dayside (J. Stawarz)	<i>Takuma Nakamura</i>	Effects of fluctuating magnetic field on the growth of the Kelvin-Helmholtz instability at the Earth's magnetopause
14:15	15'		<i>Katariina Nykyri</i>	MMS Observations of Multi-Scale Wave Structures and Energized Electrons at the High-Latitude Dayside Boundary Layer
14:30	15'		<i>Sid Fadanelli</i>	Energy densities and energy conversion rates at reconnection sites
14:45	15'		<i>Daniel Gershman</i>	Ion-Electron Decoupling in the Earth's Magnetosheath
15:00	15'		<i>C. Philippe Escoubet</i>	Magnetosheath high speed jets observed simultaneously at large distances by Cluster and MMS and future conjunctions
15:15	15'		<i>Ian Cohen</i>	Investigating the link between outer radiation belt losses and energetic electron escape at the magnetopause using MMS and Van Allen Probes
15:30	30'	Coffee Break		
16:00	15'	Dayside (K. Genestreti)	<i>Stephen Fuselier</i>	Imaging magnetosheath and magnetospheric ion populations at the Earth's subsolar magnetopause
16:15	15'		<i>Nicolas Aunai</i>	Structure of the exhaust and orientation of the X line in the case of magnetopause reconnection
16:30	15'		<i>Stefan Eriksson</i>	Reconnection Exhaust Structure at a Dayside Asymmetric Magnetopause
16:45	15'		<i>Binbin Tang</i>	Electron mixing and isotropization in the exhaust of asymmetric magnetic reconnection with a guide field
17:00	15'		<i>Nais Fargette</i>	On the ubiquity of magnetic reconnection inside flux transfer events at the Earth's magnetopause
17:15	15'		<i>Sadie Robertson</i>	Topology of flux ropes on the magnetopause
17:30	15'		<i>M. Akhavan-Tafti</i>	MMS Observations & Vlasiator Simulations of the FTE Coalescence Process
20:00	2h	Social dinner: Evening of flavors at Les Halles de Biarritz		

Thursday 24 October 2019 (Room: Rhune 2)

Time	Duration	Session	Speaker	Title
09:00	15'	Dayside / Ionospheric ions (W. Li)	<i>Brandon Burkholder</i>	Magnetospheric Multi-Scale Observation of Reconnection Near the Southern Geomagnetic Cusp
09:15	15'		<i>Sarah Vines</i>	Outer magnetospheric EMIC wave properties: An MMS case study
09:30	15'		<i>Rhyan P. Sawyer</i>	Observations of Low Energy Ions by the TRICE 2 Sounding Rocket Campaign in conjunction with the MMS spacecraft
09:45	15'		<i>Sergio Toledo-Redondo</i>	Considerations on the MMS electrostatic potential structure when measuring cold ions in the Earth's magnetosphere
10:00	15'		<i>Justin Lee</i>	Magnetospheric Multiscale observations of dense cold ions and electromagnetic ion cyclotron waves in a perturbed outer afternoon magnetosphere
10:15	30'	Coffee Break		
10:45	15'	Ionospheric ions / Methods (S. Vines)	<i>Paul Tenfjord</i>	Streaming cold proton-reconnection interaction
11:00	15'		<i>Jérémy Dargent</i>	Simulation of the impact of a cold plasmaspheric plume on magnetic reconnection
11:15	15'		<i>Vyacheslav Olshevsky</i>	Automated classification of plasma regions using 3D particle energy distribution
11:30	15'		<i>Gautier Nguyen</i>	Automatic detection of magnetic reconnection jets using machine learning
11:45	15'		<i>Quentin Lenouvel</i>	On the identification of Electron Diffusion Regions with neural networks at the magnetopause
12:00	2h	Lunch time		
14:00	15'	Bow shock (T. Phan)	<i>Matthew Argall</i>	Statistics of the magnetic field power spectrum observed by MMS
14:15	15'		<i>Levon Avakov</i>	Results of constant monitoring of the MMS/FPI MCP performance in flight
14:30	15'		<i>Michael Gedaln</i>	Collisionless relaxation in supercritical shocks
14:45	15'		<i>Mitsuo Oka</i>	Electron Scattering by Low-Frequency Whistler Waves at Earth's Bow Shock
15:00	15'		<i>Michael Starkey</i>	MMS Observations of accelerated He+ pick-up ions at a quasi-perpendicular interplanetary shock
15:15	15'		<i>Steven Schwartz</i>	Structure and evolution of a quasi-perpendicular shock: preliminary results from the MMS "Tilt Campaign"
15:30	15'		<i>Hanying Wei</i>	Shock associated whistler waves observed by MMS
15:45	30'	Coffee Break		
16:15	15'			
16:30	15'			
16:45	15'			Spillover
17:00	15'			
17:15	15'			