

# Fuel Cells and Hydrogen Joint Undertaking

## Programme Review Days 2017

### 23-24 November, Brussels



Thursday, 23 November 2017

Registration and coffee	08:15	-	08:45		
<i>Opening remarks by Atanasiu Mirela, Head of Unit Operations &amp; Communication FCH JU</i>	08:45	-	09:00		
Panel				Project Acronym	Project Title
<i>Research activities for stationary applications: Materials, components, diagnosis, performance phenomena, subsystem design and production (Panel 4)</i>	09:00	-	09:20	Portfolio overview by Tsimis Dionisis, FCH JU	
	09:20	-	09:40	ENDURANCE	Enhanced durability materials for advanced stacks of new solid oxide fuel cells
	09:40	-	10:00	SECOND ACT	Simulation, statistics and experiments coupled to develop optimized and durable $\mu$ CHP systems using accelerated tests
	10:00	-	10:20	SOSLeM	Solid Oxide Stack Lean Manufacturing
	10:20	-	10:40	NELLHI	New all-European high-performance stack: design for mass production
	10:40	-	11:00	MATISSE	Manufacturing improved stack with textured surface electrodes for stationary and CHP applications
Coffee break	11:00	-	11:30		
<i>Research activities for transport applications: MEAs, components, stacks and subsystems, hydrogen refuelling stations (Panel 2)</i>	11:30	-	11:50	Portfolio overview by Caloprisco Pietro, FCH JU	
	11:50	-	12:10	NANO-CAT	Development of advanced catalysts for PEMFC automotive applications
	12:10	-	12:30	IMPACT	Improved lifetime of automotive application fuel cells with ultra-low Pt-loading
	12:30	-	12:50	Giantleap	Giantleap Improves Automation of Non-polluting Transportation with Lifetime Extension of Automotive PEM fuel cells
	12:50	-	13:10	COMPASS	Competitive Auxiliary Power Units for vehicles based on metal supported stack technology
	13:10	-	13:30	AUTO-STACK CORE	Automotive Fuel Cell Stack Cluster Initiative for Europe II
Lunch break	13:30	-	14:30		

Panel			Project Acronym	Project Title
<i>Hydrogen production, distribution and storage: research and validation (Panel 5)</i>	14:30	-	14:50	Portfolio overview by Lympopoulos Nikolaos, FCH JU
	14:50	-	15:10	DON QUICHOTE Demonstration of new qualitative concept of hydrogen out of wind turbine electricity
	15:10	-	15:30	ELECTRA High temperature electrolyser with novel proton ceramic tubular modules of superior efficiency, robustness, and lifetime economy
	15:30	-	15:50	HyBalance HyBalance
	15:50	-	16:10	EDEN High energy density Mg-based metal hydrides storage system
	16:10	-	16:30	HYDROSOL-PLANT Thermochemical hydrogen production in a solar monolithic reactor: construction and operation of a 750 kWth plant
	16:30	-	16:50	Early Business Cases study for H2 in Energy Storage
<i>Networking cocktail</i>	16:50	-	18:20	Poster sessions for all the panels

## Friday, 24 November 2017

<i>Registration and coffee</i>	08:30	-	09:00	
Panel			Project Acronym	Project Title
<i>Technology validation in transport applications: vehicles, infrastructures, APU, fuel cells (Panel 1)</i>	09:00	-	09:20	Portfolio overview by Giron Enrique, FCH JU
	09:20	-	09:40	3EMOTION Environmentally Friendly, Efficient Electric Motion
	09:40	-	10:00	Clustering Bus Study
	10:00	-	10:20	H2ME 2 Hydrogen Mobility Europe 2
	10:20	-	10:40	HRS Availability Study
	10:40	-	11:00	HYLIFT-EUROPE Large scale demonstration of fuel cell powered material handling vehicles
<i>Coffee break</i>	11:00	-	11:30	

Panel			Project Acronym	Project Title	
<b>Cross-cutting: Pre-normative research, safety issues, education &amp; training, socio-economic &amp; benchmarking (Panel 6)</b>	11:30	-	11:50	Portfolio overview by Garcia Hombrados Alberto, FCH JU	
	11:50	-	12:10	HYPACTOR Pre-normative research on resistance to mechanical impact of composite overwrapped pressure vessels	
	12:10	-	12:30	SOCTESQA Solid oxide cell and stack testing, safety and quality assurance	
	12:30	-	12:50	HYTECHCYCLING New technologies and strategies for fuel cells and hydrogen technologies in the phase of recycling and dismantling	
	12:50	-	13:10	KNOW HY Improving the knowledge in hydrogen and fuel cell technology for technicians and workers	
	13:10	-	13:30	CERTIFHY and Guarantees of Origin Developing a European Framework for the generation of guarantees of origin for green hydrogen	
<b>Lunch break</b>	13:30	-	14:30		
<b>Technology validation in stationary applications: CHP, back-up power (Panel 3)</b>	14:30	-	14:50	Portfolio overview by Aguilo Rullan Antonio, FCH JU	
	14:50	-	15:10	ENE.FIELD European-wide field trials for residential fuel cell micro-CHP	
				PACE Pathway to a Competitive European FC mCHP market	
	15:10	-	15:30	Business models and financing arrangements for the commercialisation of stationary applications of fuel cells	
	15:30	-	15:50	STAGE-SOFC Innovative SOFC system layout for stationary power and CHP applications	
	15:50	-	16:10	DEMOSOFC Demonstration of large SOFC system fed with biogas from WWTP	
	16:10	-	16:30	POWER-UP Demonstration of 500 kWe alkaline fuel cell system with heat capture	
<b>Closing remarks by Biebuyck Bart, Executive Director FCH JU</b>	16:30	-	16:45		

# Poster Session

Thursday, 23 November, 16:50-18:20

1 - Technology validation in transport applications	2 - Research activities for transport applications	3 - Technology validation in stationary applications	4 - Research activities for stationary applications	5 - Hydrogen production, distribution and storage: research and validation	6 - Cross-cutting
3EMOTION	AUTO-STACK CORE*	ALKAMMO NIA	Cell3Ditor	BIG HIT	CERTIFHY
CHIC	COBRA	AutoRE	CISTEM	BIONICO	HYACINTH
H2ME	COMPASS	CLEARGEN DEMO	DEMSTACK	BIROBUR	HYCORA
H2ME 2	COPERNIC	D2Service	DIAMOND	DON QUICHOTE	HYPACTOR
HAWL	Giantleap	DEMCOPEM-2MW	ENDURANCE	ECo	HYRESPONSE
HIGH V.LO-CITY	H2REF	DEMOSOFC	EVOLVE	EDEN	HySEA
HYCARUS	IMPACT	ENE.FIELD	FERRET	ELECTRA	HYTECHCYCLING
HYFIVE	INSPIRE	HEATSTACK	FLUIDCELL	ELY4OFF	IRMFC
HYLIFT-EUROPE	NANO-CAT	INNO-SOFC	HEALTH-CODE	ELYntegration	KNOWHY
HYTRANSIT	SMARTCAT	ONSITE	MATISSE	GrInHy	SOCTESQA
NewBusFuel	VOLUMETRIQ	PACE	NELLHI	HELMETH	SUSANA
PURE		PEMBEYOND	PROSOFC	HPEM2GAS	
SWARM		POWER-UP	SCORED 2:0	HyBalance	
		STAGE-SOFC	SECOND ACT	HYDROSOL-PLANT	
			SOSLeM	HyGrid	
				HYTRANSFER	
				INSIDE	
				MEGASTACK	
				NOVEL	
				PECDEMO	
				SElySOs	
				SOL2HY2	
				SOPHIA	