

**< HYDROGENIUS Fatigue and Fracture Division /
I²CNER Hydrogen Materials Compatibility Division / HYDROMATE >
<HYDROGENIUS, I²CNER & HYDROMATE Joint Research Symposium >**

<Date> 9:20-17:20, Friday, February 2, 2018
<Venue> Lecture Room 3F , Shiiki Hall, Ito Campus, Kyushu University
<Language> English

<Program and Speaker>

Time	Program and Speaker
9:20-9:30	<u>Opening remarks</u> Prof. Hisao Matsunaga (Kyushu University)
	<u>Chair</u> Dr. Brian Somerday (Southwest Research Institute)
9:30-10:00	<u>Invited talk</u> Prof. Eiji Akiyama (Tohoku University) Electrochemical hydrogen permeation tests to study hydrogen embrittlement
10:00-10:30	<u>Invited talk</u> Prof. Abdelali Oudriss (University of La Rochelle) Some advances on the implication of crystalline defects on hydrogen diffusion and trapping mechanisms in fcc materials : Experimental and modelling approaches
10:30-11:00	<u>Invited talk</u> Prof. Ryosuke Matsumoto (Kyoto University) Atomistic Study of Hydrogen Effects on Stability and Mobility of Vacancy and Vacancy-Clusters
11:00-11:20	Break
	<u>Chair</u> Prof. Junichiro Yamabe (HYDROGENIUS, Kyushu University & HydroMate, AIST)
11:20-11:50	<u>Invited talk</u> Prof. Shuai Wang (University of Wisconsin) Collective dislocation behavior in the presence of hydrogen
11:50-12:20	<u>Invited talk</u> Prof. Bai An (AIST) Application of SPM-related nanotechnology in hydrogen embrittlement studies
12:20-13:20	<u>Lunch</u>
13:20-14:20	<u>Poster Session</u>
	<u>Chair</u> Prof. Arnaud Macadre (I2CNER, Kyushu University)
14:20-14:50	<u>Invited talk</u> Prof. Michal Lewandowski (TWI) Influence of high-pressure hydrogen atmospheres on mechanical performance of austenitic stainless steels at low temperatures
14:50-15:20	<u>Invited talk</u> Prof. Masanobu Kubota (I2CNER, Kyushu University) Effect of impurities added to hydrogen environment on fracture toughness of Cr-Mo steels with different strength levels

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15:20-15:50	<u>Invited talk</u> Prof. James Burns (University of Virginia) The effect of microstructure on the hydrogen environment assisted cracking susceptibility of a precipitation hardened Ni-Cu alloy
15:50-16:10	Break
	<u>Chair</u> Dr. Akihide Nagao (JFE steel)
16:10-16:40	<u>Invited talk</u> Mr. Yuhei Ogawa (Kyushu University) Interpretation of hydrogen-assisted fatigue crack propagation in a pure BCC iron based on crack tip plasticity evolution
16:40-17:10	<u>Invited talk</u> Prof. Osamu Takakuwa (HYDROGENIUS, Kyushu University) Compatibility of Type 304 stainless steel to high-pressure hydrogen gas
17:10-17:20	<u>Closing remarks</u> Dr. Brian Somerday (Southwest Research Institute)