

Workshop on “*Topics in ductile fracture of metals*” at Hotel Scandic Nidelven,
Trondheim, October 17-18, 2018

Tuesday, October 16:

20:00: Dinner at *Una Pizzeria e Bar*, Beddingen 14, 7014 Trondheim.

Wednesday, October 17:

09:00-09:30 Odd S Hopperstad

Welcome & A brief description of FractAl and CASA

09:30-10:00 David Morin:

Failure by strain localization

10:00-10:30 Thomas Pardoën:

Microstructure heterogeneity dominated ductile fracture

10:30-11:00 Coffee break

11:00-11:30 Lars Edvard Dæhli:

Influence of yield surface curvature on the macroscopic yielding and ductile failure of isotropic porous plastic materials

11:30-12:00 Cihan Tekoğlu:

Ductile tearing of aluminum plates

12:00-13:00 Lunch

13:00-13:30 Emil Christiansen

Lattice rotations in precipitate free zones in an Al-Mg-Si alloy

13:30-14:00 Christian Niordson:

Modeling size-effects in porous metals

14:00-14:30 Dirk Mohr:

Fracture and plasticity of aluminum 7075 during hot stamping: experiments and modeling

14:30-15:00 Coffee break

15:00-15:30 Kim Lau Nielsen :

Ductile plate tearing: from micromechanics to large-scale modeling

15:30-16:00 Bjørn Håkon Frodal:

Ductile failure of textured aluminium alloys under compression-tension loading: experiments, modelling and simulations

16:00-16:30 Thilo Morgeneyer:

Strain localization and damage interactions in aluminium alloys: 3D in situ measurements and FE simulations

19:00 Dinner at Hotel Scandic Nidelven

Thursday, October 18:

09:00-09:30 Mikhail Khadyko:

Anisotropic plasticity and fracture of extruded aluminium alloy AA6063 in different tempers: experiments and crystal plasticity modelling

09:30-10:00 Ahmed Benallal:

Anisotropic constitutive equations for ductile porous materials

10:00-10:30 Coffee break

10:30-11:00 Jonas Faleskog:

Application of a non-local porous plasticity model to ductile fracture – modelling of the length parameter in the low to high triaxiality regime

11:00-11:30 Tore Børvik:

Microstructure based simulations of protective structures in aluminium

11:30-12:30 Discussions

12:30-13:30 Lunch