

Priority Program Compositionally Complex Alloys / High Entropy Alloys: Kick-Off Meeting for 2nd Project Phase



	13 April 2021, Tuesday			14 April 2021, Wednesday		
Time slot	Speaker	Institute	Short Title	Speaker	Institute	Short Title
10:00 - 10:15	Glatzel, Uwe	Uni Bayreuth	Introduction, some remarks and smalltalk	Noori, Mehdi	RWTH Aachen	Thermodynamic modelling in HEAs
10:15 - 10:30				Haase, Christian	RWTH Aachen	Mechanism-oriented design of CCAs
10:30 - 10:45	Gärtner, Eric	IWT Bremen	Synthesis of particle-reinforced CCA produced by additive manufacturing	Laube, Stephan	KIT	Development of refractory complex concentrated alloys for high-temperature applications
10:45 - 11:00	Jägle, Eric	Uni Bw M	Fracture toughness, fatigue, and hydrogen resistance of additively manufactured p-CCAs	Schellert, Steven	KIT	High temperature oxidation behavior of Ta-Mo-Cr-Ti-Al RHEA with different Ta concentrations
11:00 - 11:15	Körmann, Fritz	MPIE	Stability and interstitial doping in high-entropy alloys from ab initio	Gärtner, Daniel	Uni Münster	Tracer diffusion in single crystalline CoCrFeNi and CoCrFeMnNi HEA
11:15 - 11:30	Ma, Yan	MPIE	Interstitial doping in high-entropy alloys	Sen, Sandipan	Uni Münster	Solute and self-diffusion in Hexagonally Close Packed (HCP) HEAs
11:30 - 11:45	Kottke, Josua	Uni Münster	Diffusion in Ni-HEAs	Gemagami, Parham	RU Bochum	Phase stability, precipitation kinetics, nanoscale elemental distributions and their effect on tensile properties in refractory TiZrNbHfTa BCC HEA
11:45 - 12:00	Taherinija, Shabnam	Uni Münster	Studying the structural evolution of nanocomposite HEAs after irradiation	Zhao & Li	RU Bochum	
12:00 - 13:15	Lunch Break			Lunch Break		
13:15 - 13:30	Keil, Tom	TU Darmstadt	Structure, solid solution hardening and deformation mechanisms of bcc HEAs using diffusion couples	Deck, Korbinian	KIT	Intrinsic deformation mechanisms in BCC HEA
13:30 - 13:45	Nag, Shankha	TU Darmstadt	Grain boundary phases and mobility in elements and complex concentrated alloys	Suarez Ocano, Patricia	BAM Berlin	Microstructural properties of AlMo _{0.5} NbTa _{0.5} TiZr refractory CCA
13:45 - 14:00	Oluwabi, Oluwaseyi	RU Bochum	Alloy Chemistry, Alloy Development, Microstructures and Martensitic Transformations	Drescher, Sophie	IFW Dresden	The analysis of the strengthening mechanisms in single-phase high-entropy alloys
14:00 - 14:15	Hinte, Christian	Uni Hannover	Quinary and Senary High Entropy Shape Memory Alloys: Extrusion, Functionality, Degradation	Tirunilai, Aditya	KIT	Discontinuous Deformation of FCC High and Medium Entropy Alloys at Close to 0 K
14:15 - 14:45	Coffee Break			Coffee Break		
14:45 - 15:00	Haas, Sebastian	Uni Bayreuth	Refractory metals improving the mechanical properties of Al ₁₀ Co ₂₅ Cr ₈ Fe ₁₅ Ni ₃₆ Ti ₆	Schneider, Mike	RU Bochum	Temperature dependence of mechanical properties and deformation mechanisms in an CrFeNi MEA
15:00 - 15:15	Bezold & Neumeier	FAU Erlangen	Polycrystalline High Entropy Superalloys (PHESA)	Gadelmeier, Christian	Uni Bayreuth	Strengthening mechanisms of CrCoNi and CrMnFeCoNi at creep temperatures above 700°C
15:15 - 15:30	Wolff-Goodrich, Silas	MPIE	Microstructure Formation and High Temperature Mechanical Properties of Al ₂₀ Cr ₂₀ Fe ₃₅ Ni ₂₀ Ti ₅	Glatzel, Uwe	Uni Bayreuth	Picture show of ICHEM 2020 in Berlin and closing remarks
15:30 - 15:45	Zhang, Jingfeng	Uni Münster	Diffusion in sigma phase of the CoCrFeMnNi system			
15:45 - 16:00	Lukianova, Olga	Uni Münster	Impact of carbon on diffusion in CoCrFeMnNi			