

Exp5_ontology_test

Date: 2024-08-02
Status: Success
Created by: Manuel Vollbrecht

Title:

Date of experiment:	01.07.2024
Experimenter:	Manuel Vollbrecht
Assistant:	
Goal of Experiment:	

Flame 1 (front) - precursors										
Sample ID	Element	Precursor (Metal)	Precursor provider (metal)	Precursor LOT number (metal)	Precursor (solvent)	Precursor provider (solvent)	Precursor LOT number (solvent)	used volume of precursor solution [ml]	precursor molarity [M]	notes:

exp5	Co	Co naphthenate	Strem	CHGDFX	xylene	VWR	GKKTDD	75	0.1	
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Flame 1 (front) - gas and dispersion parameters													
Sample ID	precursor feed rate [ml/min]	dispersion gas (type)	dispersion gas purity	dispersion gas flow rate [l/min]	fuel gas (type)	fuel gas purity	fuel gas flow rate [l/min]	O ₂ gas purity (pilot flame)	O ₂ flow rate [l/min] (pilot flame)	sheath gas (type)	sheath gas purity	sheath gas flow rate [l/min]	notes:
exp5	5	oxygen	5.0	5	methane	3.5	1.5	5.0	3.2				

Flame 1 (front) - reactor set-up						
Sample ID	Nozzle type (e.g. Tethis)	nozzle-filter distance [cm]	nozzle angle [°]	pressure drop at nozzle [bar]	final pressure drop [mbar]	notes:
exp5	Tethis	60	0	1.5	210	

Flame 2 (back) - precursors

Sample ID	Element	Precursor (Metal)	Precursor or provider (metal)	Precursor LOT number (metal)	Precursor (solvent)	Precursor provider (solvent)	Precursor LOT number (solvent)	mass of metal precursor [g]	total volume of precursor solution [ml]	precursor molarity [M]	notes:

Flame 2 (back) - gas and dispersion parameters

Sample ID	precursor feed rate [ml/min]	dispersion gas (type)	dispersion gas purity	dispersion gas flow rate [l/min]	fuel gas (type)	fuel gas purity	fuel gas flow rate [l/min]	O ₂ gas purity (pilot flame)	O ₂ flow rate [l/min] (pilot flame)	sheath gas (type)	sheath gas purity	sheath gas flow rate [l/min]	notes:

Flame 2 (Back) - reactor set-up

Sample ID	nozzle type (e.g. Tethis)	nozzle-filter distance [cm]	horizontal nozzle distance [cm]	nozzle angle [°]	pressure drop at nozzle [bar]	final pressure drop [mbar]	notes:

Results				
Sample ID	empty filter [g]	covered filter [g]	sieving grid [μm]	Product after sieving [mg]
Exp5	4.95	5.42	250	420

Notes/observations:



Unique eLabID: 20240802-21a6896d25f1807e7dfacfea23f19574f69185d9
Link: <https://elabftw.iwt.zz/experiments.php?mode=view&id=2443>