

# Custom software & accessories

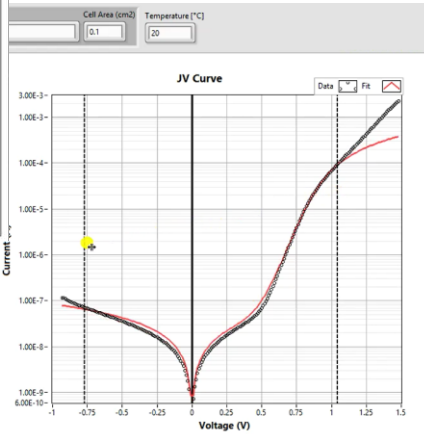
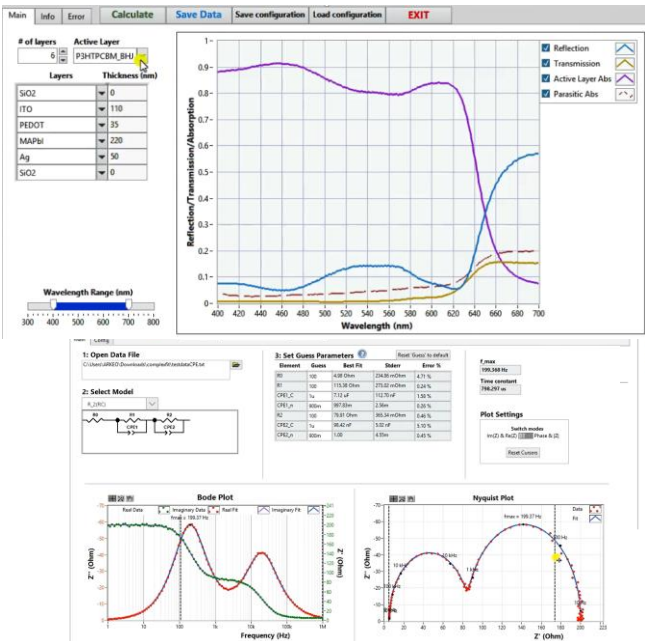
# Arkeo all-in-1



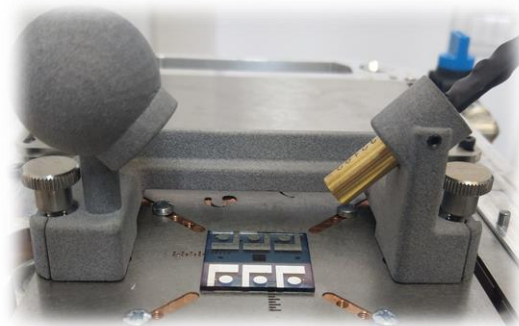
cicci  
research



Customizable measurement system for opto-electronic devices



# Arkeo multichannel



Multichannel platform with programmable light soaker and environmental chambers

## Contact info

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# Arkeo all-in-1

From steady state to dynamic test in one platform

## Modules

### Steady State Tests

- ▶ Dark and illuminated JV (0.001 to 2 SUNs equivalent)
- ▶ Voltage dependent IPCE
- ▶ Electro- and photo-luminescence
- ▶ 4-point resistivity

### Transient Tests

- ▶ Transient JV
- ▶ Transient photo-voltage/current
- ▶ CELIV (dark & illuminated)

### Dynamic Tests

- ▶ EIS
- ▶ IMVS/IMPS

## Accessories

### Sample holder

- ▶ Customized (3D printed)

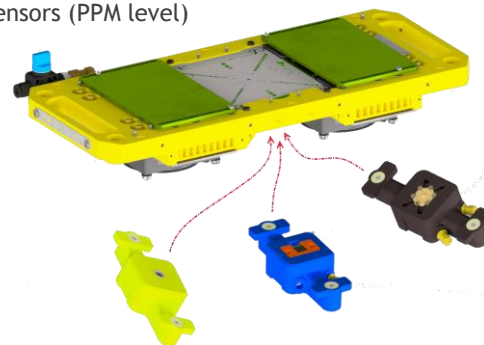
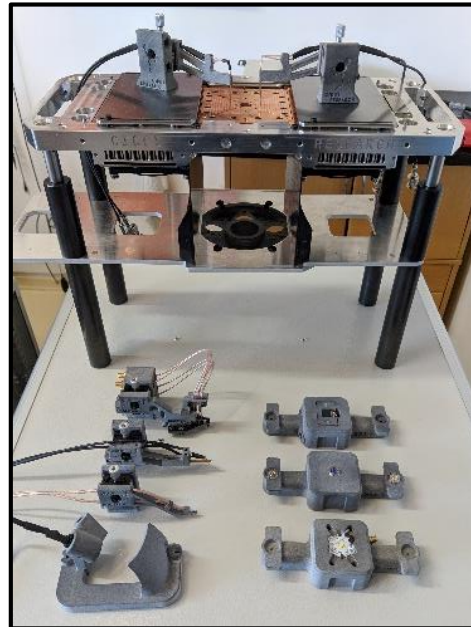
### Sealed Test Chamber

- ▶ Sealed chamber with quartz inspection window
- ▶ Integrated Oxygen and Humidity sensors (PPM level)
- ▶ Customized electrical connections

### Microfluidic Module

- ▶ Synchronized pumping system

### Temperature Modulation



# Arkeo multichannel

- 32 (64) independent Source Meter Units (not multiplexed!)
- $\pm 10V$  @ 250 mA ( $\pm 20 V$  with two SMUs connected in series)
- 250kHz of SMU Bandwidth for transient tests
- Proportional-Integral Closed loop intensity regulation for best long-term stress tests
- Temperature control system for general stage or chamber unit.
- Programmable small or large area LED based illumination

State	Test	Direction	Saturated Next JV	End of Test	Start-up Time	Last Tracking	Last JV	End of Test
SA	Running Tracking		1.5 min	999.7 hrs	14-10-19 14:29:21	14-10-19 14:46:54	14-10-19 14:41:42	25-11-19 05:29:21
SB	Running Tracking		1.8 min	999.7 hrs	14-10-19 14:29:32	14-10-19 14:46:56	14-10-19 14:42:05	25-11-19 05:29:32
SC	Running Tracking		1.9 min	999.7 hrs	14-10-19 14:29:32	14-10-19 14:46:54	14-10-19 14:42:06	25-11-19 05:29:32
SD	Running Tracking		1.9 min	999.7 hrs	14-10-19 14:29:33	14-10-19 14:46:56	14-10-19 14:42:07	25-11-19 05:29:33
SA	Stopped JV	Reverse	SAT		14-10-19 14:29:33			
SB	Stopped JV	Reverse	SAT		14-10-19 14:29:33			
SC	Stopped JV	Reverse	SAT		14-10-19 14:29:32			
SD	Stopped JV	Reverse	SAT		14-10-19 14:29:33			

