



SOLE SOURCE CERTIFICATE AND POSTING NOTICE

(Greater than \$150,000)

A sole source procurement is when you make a request to purchase product(s) and/or service(s) without competition when competition is otherwise required. This means that product/service is unique and that the supplier is the only supplier that can provide the product or service. In accordance with the authority granted under applicable Florida law and UCF Regulation 7.130, the following documentation is submitted in support of this request.

This form and related documentation shall be submitted through Workday Help using case type Waivers and Sole Source. Please do not attach to a requisition or send via email for review and approval.

WD case subject title should have common structure for easy tracking, to include:

- Exemption type (Sole Source)
- Supplier name
- Purchase amount

The completed sole source must be approved in the following order. **Please be sure to obtain all required signatures before submitting the form to Procurement Services.**

- PI/Researcher/Director/Chair
- President/Vice President/Dean
- Procurement Specialist
- Procurement Services Manager or Associate Director
- Assistant Vice President for Tax, Payables & Procurement, who will review and provide a recommendation to approve or disapprove the sole source to:
- Chief Financial Officer, who will either directly approve or disapprove the sole source, or forward it to the Provost and Executive Vice President for goods/services related to academia for input prior to making the final decision.

Once the completed sole source is received, Procurement Services in collaboration with kNEXT reviews the documentation provided and determines whether the sole source is valid or if there are additional suppliers that may be able to provide the requested product or service. The sole source review and approval process varies based on the nature of the product/service being requested and the information provided in the requestor's justification, among other factors, so please keep this in mind when submitting the form.

Contingent upon the approval of all the officers/individuals listed, the sole source shall be posted on the UCF Procurement Services website for seventy-two (72) hours. Upon expiration of said posting period, Procurement Services will process a purchase order upon receipt of the requisition.

The usual bidding process shall be conducted if sole source approval is not granted.

PART I: DEPARTMENT AND SUPPLIER INFORMATION

Department Name: ECE Contact & Phone: Wayesh Qarony; 4078231212
Product/Service Cost: \$209,000
 One Time Purchase Term Contract: _____
 Multiple Purchases Duration: _____

Company Name: PASQAL Email: orders@pasqal.com
Contact Person: Richard Hostein Title: VP - Cold and Vacuum Engineering Department
Product and/or Service: Closed-cycle Cryostat for Quantum Device Experiment

PART II: SOLE SOURCE JUSTIFICATION (see pages 4-5)

Only justifications submitted on this form and in the below format will be reviewed for approval. All the listed points MUST be fully answered on the following pages and any additional attached pages as needed. Failure to submit justification as outlined in the format below will result in the form being returned without review.

PART III: SOLE SOURCE CERTIFICATIONS

- A. In my professional opinion, this is the only product or service that can reasonably meet my requirement(s)/specification(s), and this is the only supplier who can provide the product or service. I further certify that the information contained herein is true and correct to the best of my knowledge and belief and would withstand any audit or supplier protest.
- B. I, the undersigned, certify that I and/or the user do not have a financial interest in the above named supplier or contractor, and that I am unaware of any conflict of interest related to this purchase.

Wayesh Qarony
Digitally signed by Wayesh Qarony
Date: 2024.10.24 16:56:59 -0400

Signature

Wayesh Qarony

Printed Name and Title (PI/Researcher/Director/Chair)

10/24/2024

Date

michaelg
Digitally signed by michaelg
Date: 2024.11.12 14:16:47 -0500

Signature

Michael Georgiopoulos

Printed Name and Title (President/Vice President/Dean)

(Delegations not allowed; emails from absent approvers are acceptable)

Date

I, the undersigned, hereby concur with the above justification and support a sole source approval for the above product(s) and/or service(s). Approvals may be documented and supported via email.

See below Email for approval

Signature

Printed Name and Title (Procurement Specialist)

Date

See below Email for approval

Signature

Printed Name and Title (Procurement Services Manager or Associate Director)

Date

See below Email for approval

Signature

Printed Name and Title (Asst. Vice President for Tax, Payables & Procurement)

Date

See below Email for approval

Signature

Printed Name and Title (Chief Financial Officer)

Date

POSTING NOTICE

12/6/2024 at 11:00am

12/9/2024 at 11:00am

2503

Trinh Nguyen

Date/Time Posted

Posting End Date

UCF Control No.

Procurement Specialist

SOLE SOURCE JUSTIFICATION

Please answer the questions below and attach additional documentation if needed.

1. Describe the product(s) and/or service(s) and anticipated use thereof in layman's language.

This is a cryogenic chamber and associated components where semiconductor and superconductor photonic devices will be kept under very low temperature for quantum optics experiments.

2. Describe the required specifications or requirements and why are they essential to the accomplishment of your work.

This system has two thermal stages (1.0 Kelvin and 3.0 Kelvin). 1.0 Kelvin thermal stage will be dedicatedly occupied for cooling the superconductor-based devices, while 3 Kelvin stage will be used for conducting quantum experiments.

Provide the names of other suppliers, products and/or services that you have investigated and explain why they do not meet the required specifications or requirements. It may be helpful to present your information in a table like the one below.

Required Specifications	Supplier 1	Supplier 2	Supplier 3	Supplier 4
	Y/N	Y/N	Y/N	Y/N
	Y/N	Y/N	Y/N	Y/N
	Y/N	Y/N	Y/N	Y/N
	Y/N	Y/N	Y/N	Y/N

There are two other suppliers in the market: Attocube and Montana. None of them can provide a closed-cycle cryostat with two separate thermal stages, where we can keep those separately. Only PASQAL can provide my required customized system.

3. State in detail why only this and no other product(s)/service(s) will satisfy the department's requirements. Description may include unique features, compatibility, specifications, availability, delivery time frame etc. (For example, please list the features or special conditions that are unique and only available from one supplier. Note: Price is not a valid reason.)

I require a cryogenic system with two different thermal stages (1.0 Kelvin and 3.0 Kelvin). This product has two separate large chambers, where one can be used for the Quantum experiments and other can be used for the superconductor devices. Large chamber is critical as we need to put superconductor sensor-related electronics and wiring inside the chamber. This is unique that PASQAL can customize for us and make such system.

However, other suppliers such as Montana and AttoCube can not provide two thermal stages. Also their chambers are sufficient for keeping superconductor electronics as the spacing is very limited.

4. Are there resellers or distributors? If yes, please list names and contact information.

No

5. Will this purchase obligate UCF to this vendor for future purchases such as maintenance, licensing, or continuing need? ___ Yes No

If yes, please provide details regarding future obligations and/or needs to include number of years and total spending amount of obligations:

6. What efforts have been made to obtain the best pricing available? Please provide an explanation to support the belief that the price is fair and reasonable.

First of all, the system is unique which can not be customized by any other suppliers. Even this unique system with two separate thermal stages, the product price is lower than the products with a single thermal stage from other vendors such as Montana and Attocube.

Then I further negotiated the prize a couple of times. The current quotation is a negotiated one which can be seen from the quotation.

From: [Gerald Hector](#)
To: [Joel Levenson](#)
Cc: [Brian Sargent](#); [Trinh Nguyen](#); [Nellie Nido](#)
Subject: RE: C0108366:New Sole order for Dr. Qarony
Date: Thursday, December 5, 2024 6:10:23 PM
Attachments: [jmaae005.png](#)
[jmaae007.png](#)

Joel:

I am in support of this sole source request.

Regards,

Gerald L. Hector, CPA
Senior Vice President
Administration and Finance
University of Central Florida
4635 Andromeda Loop N
MH384
Orlando, FL 32816
Tel: (407) 823-1063
Email: gerald.hector@ucf.edu



From: Joel Levenson <Joel.Levenson@ucf.edu>
Sent: Thursday, December 5, 2024 9:46 AM
To: Gerald Hector <Gerald.Hector@ucf.edu>
Cc: Brian Sargent <Brian.Sargent@ucf.edu>; Trinh Nguyen <Trinh.Nguyen@ucf.edu>; Nellie Nido <nellie.nido@ucf.edu>
Subject: FW: C0108366:New Sole order for Dr. Qarony

Good morning Gerald,

I also support this sole source. The PI has listed requirements and compared with other providers, which do not meet the needs of the PI. Additionally, another institution has awarded a sole source purchase for this piece of equipment as well.

Please review and if you agree, reply all to this email and indicate as such. If you have additional questions, let me know.

From: Brian Sargent <Brian.Sargent@ucf.edu>
Sent: Wednesday, December 4, 2024 2:33 PM
To: Joel Levenson <Joel.Levenson@ucf.edu>
Cc: Trinh Nguyen <Trinh.Nguyen@ucf.edu>; Nellie Nido <nellie.nido@ucf.edu>
Subject: FW: C0108366:New Sole order for Dr. Qarony

Good afternoon Joel,

I also support this sole source submitted by the College of Engineering and Computer Science for a Closed-Cycle Cryostat. There are only 3 firms in the marketplace who sell closed cycle cryogenic chambers but only PASQAL's system meets all the requirements.

Additionally, search of GovSpend identified a sole source that was approved by the University of Albany for the same equipment.

Please approve/disapprove and let me know if you have any questions.

Regards,
-Brian

From: Trinh Nguyen <Trinh.Nguyen@ucf.edu>
Sent: Wednesday, December 4, 2024 1:35 PM
To: Brian Sargent <Brian.Sargent@ucf.edu>
Cc: Nellie Nido <nellie.nido@ucf.edu>
Subject: FW: C0108366:New Sole order for Dr. Qarony

Hi Brian,

I have reviewed the attached sole source and can support it for the following reasons. Can you please also review to see if you agree or not.

Vendor: PASQAL
Product: Closed-Cycle Cryostat Optidry 250 for Quantum Device Experiment
Total Amount: \$209,000
Dept: ECE

Requirement: The department wants to purchase a cryogenic system from PASQAL with two different thermal stages and two separate large chambers to use, one for Quantum experiments and the other one for superconductor devices. The required specifications are listed below.

Research Conducted: The PI noted that there are two other suppliers, Attocube and Montana, in the market for the closed-cycle cryogenic chamber besides PASQAL. However, only the product from PASQAL can meet the below specifications.

Specifications	PASQAL	Attocube	Montana
A closed-cycle cryostat with two separate thermal stages: 1.0 Kelvin and 3.0 Kelvin	Yes	No	No

Two separate large chambers where one will be used for Quantum experiment and the other one for superconductor devices.	Yes	No	No
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Attocube and Montana cannot provide the required two thermal stages and the spacing of their chambers are limited. The large chamber is critical as the department needs to put superconductors, sensor-related electronics and wiring

inside the chamber. There are no resellers/distributors for this product.

Price is fair and reasonable: The price is deemed fair and reasonable given that the PASQAL product is the only one that can meet the above requirements. In addition, the PI noted that the pricing from PASQAL is lower than the single thermal stage vendors. The PI negotiated the total cost.

GovSpend: In GovSpend under the Bids and RFPs search, the below single/sole source posting came up for the PASQAL, Cryostat Optidry 250, product from The University of Albany, for the same chamber that the above department is purchasing (See attached New York State Contract posting).

Cryostat Optidry 250

#7D02316D-7215-4FC6-B38A-91C03C334C7D

[Lists 0](#)
[Tasks 0](#)
[Notes 0](#)
[Tags 0](#)
[New Features BETA](#)
[Account](#)

Expired 10 months ago
Due Date
Posted
Date Updated

01/31/2024
01/24/2024
01/24/2024

[View on agency site](#)

Summary

Issue Date: 01/24/2024 Ad End Date: 01/31/2024 Category: Medical & Laboratory Equipment - Commodities Ad Type: Notice of sole/single source or procurement exempt from advertising

Details
No Files
No Historical Files
History

Issue Date:
01/24/2024

Ad End Date:
01/31/2024

Category:
Medical & Laboratory Equipment - Commodities

Ad Type:
Notice of sole/single source or procurement exempt from advertising

Thanks,
Trinh

From: Brian Sargent <Brian.Sargent@ucf.edu>
Sent: Thursday, November 21, 2024 9:11 AM

To: Reyner Martinez <Reyner.Martinez@ucf.edu>
Cc: Trinh Nguyen <Trinh.Nguyen@ucf.edu>
Subject: C0108366:New Sole order for Dr. Qarony

Good morning Reyner,

Trinh Nguyen has been assigned to review this sole source. She will reach out with any questions

Regards,

Brian



The New York State Contract Reporter

This document printed
Wednesday, 12/04/2024

*NYS' official source of contracting opportunities
Bringing business and government together*

Contracting Opportunity

* * * This ad is closed and is in the archives * * *

Title: Cryostat Optidry 250

Agency: State University of New York (SUNY)

Division: University at Albany

CR Number: 2105888

Contract Term: 02/16/2024-06/30/2024

Date of Issue: 01/24/2024

Ad End Date: 01/31/2024

County(ies): All NYS counties

Classification: Medical & Laboratory Equipment - *Commodities*

Opportunity Type: Notice of sole/single source or procurement exempt from advertising

Entered By: John Pomeroy

Description: Consistent with Chapter 862 of the Laws of 1990, The University at Albany requested an exemption from initially publishing this contract opportunity in the NYS Contract Reporter. In accordance with Section 144(2)(e) of the Economic Development Law, the Office of the State Comptroller has granted this exemption.

Reason for advertising exemption: Single Source

Award recipient: Pasqal

Any questions or comments regarding this notice of sole-source, single-source, or procurement otherwise exempt from advertising in the NYS Contract Reporter should be directed to the contact person listed for the contracting agency or public authority.

Contact Information

Primary contact: State University of New York (SUNY)
University at Albany
Procurement Services
John Pomeroy
Purchasing Associate
1400 Washington Ave.
MSC Room 302
Albany, NY 12222
United States
Ph: 518-437-4579
jdpomeroy@albany.edu

Bid Results

Bid Results have not been entered

Awards

Awards have not been entered

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From

To

PASQAL
 Name: Richard Hostein
 7 rue Léonard de Vinci
 91300 Massy
 France

Phone: +33 9 54 99 11 19
 Email: orders@pasqal.com
 Web: https://www.pasqal.com/

ECE, University of Central Florida
 Doctor Wayesh Qarony
 4328 Scorpius St
 Orlando, FL 32816
 United States

Incoterm : DAP - Orlando

Amount in US Dollars currency

Description	Sales tax	U.P. (net)	Qty	Disc.	Total (excl. tax)
OL-PF-02-000 - Optidry 250 Cryostat Optidry 250 including : Cryocooler : - Cold head pulse tube type RP082B2S remote rotary valve - Compressor F70H 380-420 V 50/60Hz - High pressure lines 20m (65 feet) Cryostat : - Standard Cryocase™ - Optical extension for cold plate Ø250mm - 4 horizontal optical windows at 90° and one vertical clear bore 44mm (windows Ø 50mm) - 1 pressure sensor Full range (1000-10-9mB) Wiring: - 1 line 24 pins fischer 105 for temperature control of the sample space (sensors and heaters) - 1 line 6 pins fischer 103 for temperature control of the shield (sensor and heater) - 1 cernox Cu calibrated 325K-3K and one heater 10W for the cold plate - 1 PT100 soft calibrated and one heater 50W for the shield - 1 DC line 24 pins (copper or constantan or mixed, wire twisted by pair) - 4 channels temperature controller Lakeshore 336 (or equivalent) - 1 Control interface MyCryoDisplay™ Accessories : - Tool box - Documentation and remote control software MyCryoSoftware™ Performances : - Base temperature on the cold plate : guaranteed T<3K (expected 2,8K) - Cooling power available on the cold plate : guaranteed 300mW @4,2K (expected 350mW @4.2K) - Displacement XYZ< 15nm RMS Maintenance : Rotary valve : 20 000 hours ; Compressor 30 000 hours	0%	165,825.00	1	10%	149,242.50

<p>00-V-07-005 - DC Wire Line 24 - copper DC wire line 24 pins: -300K connector and cable mounted one side, pig tail other side - 12 copper twisted pairs woven loom (AWG 38 Insulator polyester, 2.3 ohms/m) - 4 K connector, 2 rows socket stip numbering support ; pitch 2mm adapted to standard Attocube piezo connector</p>	0%	2,200.00	1		2,200.00
<p>00-V-07-305 - Coaxial line with SMA CuBe-SS 1,2mm RF line for Optidry 250 composed of :</p> <p>- Rigid coaxial cable 2,19mm diameter, CuBe/Silver plated core, CuBe outer conductor, 50cm, 300K->50K</p> <p>- Semi-rigid cable 1.19mm diameter, Cu/Sn core, Cu outer conductor, 70cm, 4K->4K</p> <p>Frequency : DC to 20GHz</p> <p>Insertion losses (typical) @300K : 1.0 dB/m @0.5 GHz, 1.4 dB/m @ 1 GHz, 3.1 dB/m @ 5 GHz, 4.4 dB/m @10 GHz, 6.3 dB/m @20 GHz</p> <p>Insertion losses (typical) @4K : 0.3 dB/m @0.5 GHz, 0.5 dB/m @ 1 GHz, 1.1 dB/m @ 5 GHz, 1.5 dB/m @10 GHz, 2.2 dB/m @20 GHz</p> <p>Connectors : SMA at both ends</p> <p>Non magnetic</p>	0%	1,980.00	4	40%	4,752.00
<p>OL-PF-05-000 - Option 1,5K He4 extra loop Extra loop He4 for 1,5K base temp system including :</p> <p>- Gas Handling system with a 30L He4 tank, circulation pump, LN2 trap and Ln2 dewar (15L) - Cold finger and 1,5K Plate (~diam 20mm) - 4K radiation Shield</p> <p>Base temperature <1,3K Cooling power available 10mW@1,5K</p> <p>Important note :</p> <p>- We propose to include a cold plate inside the Cryocase with a temperature <2K with threaded holes in order to install SNSPD detectors. - A plate (70*30mm) at 40K is available for the client in order to mount SNSPD electronic - Upon request, electrical feedthrough at 300K can be provided. - For optical fiber, a KF25 port will be available at 300K</p>	0%	41,800.00	1		41,800.00
<p>Pumping group Option :</p> <p>Flexy TPS-TV74FS/IDP3 NW40KF</p> <ul style="list-style-type: none"> • TV74 FS NW40KF Turbomolecular Pump (Agilent) Pumping speed: 56 l.s-1 (N2) Ultimate vacuum: < 8.10(-10) mbar Inlet flange: NW40KF Exhaust flange: NW16KF • Rack Control Unit TV74-AG RS232-485 interface 110/220V 					

<ul style="list-style-type: none"> • Dry Scroll Pump IDP3 Flow rate: 3m3/h Ultimate vacuum: 2.10(-1) Torr Inlet flange: DN16KF • Cooling fan for V74FS • Safety filter for V74FS • Copper gasket (KF25) (2m) • Clamps and gaskets • Adapter 40/25 • Bellows valve DN25 • Mobile support • Delivered in parts. Assembly carried out by our team during delivery. 	0%	6,743.00	1	6,743.00
HTS 100A Current Lead Pair <ul style="list-style-type: none"> • 300K Sealed Feedthrough • 50K Thermalization • One pair of HTS 100A current leads • Mounting in Optidry 	0%	2,734.00	1	2,734.00
Shipping and installation	0%	7,215.00	1	7,215.00
Special offer Discount after negotiation	0%	-5,686.50	1	-5,686.50

Availability delay: 8 Months

Payment by transfer to the following bank account:

Bank: BNP

Bank code	Branch code	Account number	Checksum
30004	02999	00010038619	04

Address: Centre d'affaire Ile de France Innovation

Account owner name: PASQAL SAS

IBAN account number: FR76 3000 4029 9900 0100 3861 904

BIC/SWIFT code: BNPAFRPPXXX

Total (excl. tax) 209,000.00

Total (inc. tax) 209,000.00

Written acceptance, company stamp, date and signature