



OREGON STATE UNIVERSITY REQUEST FOR QUOTE (RFQ)

RFQ #		ML173504	ISSUE DATE:	November 21, 2014
DELIVER TO:		REQUESTED BY / RETURN QUOTE TO:		
DEPARTMENT:	Crop & Soil Science	NAME:	Mark Lessel	
ADDRESS:	Oregon State University, 107 Crop Science Building	E-MAIL:	Mark.lessel@oregonstate.edu	
CITY, STATE ZIP:	Corvallis, OR 97331	TELEPHONE:	541-737-3667	
REQUIRED DELIVERY DATE:	1-21-2015	FAX:	541-737-2170	

ITEM	DESCRIPTION	QTY	UNIT	UNIT PRICE	TOTAL PRICE
1	FT-IR Spectrometer TENSOR II (See Attached Spec Sheet item 1)	1	EA		
2	A225/QITII Integrated Platinum-ATR-accessory, Diamond, 1 Bounce, QuickLock (See Attached Spec Sheet item 2)	1	EA		
3	OPUS Spectroscopy Software O/IR+ OPUS/IR, FT-IR Spectroscopy Software Package (See Attached Spec Sheet Item 3)	1	EA		
4	O/SR-NP OPUS/SEARCH for Software Package (See Attached Spec Sheet Item 4)	1	EA		
5	CS81/25+ Data System, Ultra Slim Desktop (See Attached Spec Sheet item 5)	1	EA		
6	S950+ Service with Orders(See Attached Spec Sheet Item 6)	1	EA		
7	S881 Services and Support Warranty Extension (See Attached Spec Sheet item 7)	1	EA		
8	S881-L Warranty Extension for Laser (See Attached Spec Sheet item 8)	1	EA		
9	S882-P Warranty Extension for Platinum ATR A225/Qx (See Attached Spec Sheet Item 9)	1	EA		
SHIPPING COSTS MUST BE ADDED TO ITEMS					

Delivery is f.o.b. destination, prepaid and allowed. Shipping, freight and handling must be included in quoted prices. Additional costs for such are disallowed. **TOTAL**

DELIVERY TIME AFTER RECEIPT OF ORDER: _____ **PRICES VALID THROUGH:** _____

SPECIAL INSTRUCTIONS:	VENDOR INFORMATION:		
<p>1. Unless otherwise specified, all items quoted are to be new, unused and not remanufactured in any way.</p> <p>2. Brand names are for the purpose of describing and establishing the characteristics desired and are not intended to limit or restrict competition. Quoters may submit quotes for substantially equivalent products unless the RFQ provides that a specific brand is necessary because of compatibility requirements, etc. All such brand substitutions shall be subject to approval by OSU.</p> <p>3. Quoters must clearly identify all products quoted. Brand name and model or number must be shown.</p> <p>4. Only documents issued as addenda by OSU serve to change the RFQ in any way.</p> <p>5. OSU reserves the right to make the award by item, partial or whole lots, groups of items or entire quote, whichever is in the best interest of OSU.</p> <p>6. OSU may reject any Quote not in compliance with the RFQ, attachments, and addenda, or if it is in the best interest of OSU.</p>	COMPANY:		
	ADDRESS:		
	CITY, STATE, ZIP:		
	CONTACT NAME:		
	E-MAIL:		
	TELEPHONE:		
	FAX:		
	VENDOR SIGNATURE:		
	<i>By signature below the undersigned certifies that they are authorized to act on behalf of the quoter and will comply with all aspects of the quote herein.</i>		
	SIGNATURE:		
	NAME/TITLE:		

This procurement is subject to the indicated Oregon State University Standard Terms and Conditions for: Goods Services Purchase Order Construction Software. The indicated terms and conditions may be viewed at <http://pacs.oregonstate.edu/terms-and-conditions>

RFQ # ML173504 Spec Sheet

Item

Spectrometer

1

TII

FT-IR spectrometer TENSOR II

Spectral range: 8,000-340cm⁻¹

Spectral resolution: Better than 0.4cm⁻¹

Mirror velocity: 5 speeds, 1.4 - 51mm/Sek. opd

RapidScan: More than 25 spectra at 16cm⁻¹ spectral resolution

The following relevant components are included in the standard configuration:

- a) MIR-KBr-beam splitter
- b) Room temperature DLATGS detector
- c) High intensive IR source with electronic stabilization for extreme long life time
- d) Diodelaser with extreme long life time
- e) High performance electronics providing high stability against mechanical disturbances and vibrations; includes power mode for low intensity applications with DLATGS detector
- f) Aperture wheel with 11 positions
- g) Validation wheel with 6 positions and integrated NIST standard
- h) OPUS spectroscopy software package with comprehensive functionality for data acquisition, data evaluation and data visualization. Provides automated validation routines (OQ, PQ) according to cGMP, 21 CFR Part 11 as option. Validation according to European, US, and Japanese pharmacopela with integrated NIST-standard available.

ATR units

2

A225/QITII

Integrated Platinum-ATR-accessory, Diamond, 1 bounce, QuickLock

Specifications:

- Diamond crystal, single reflection, edged in tungsten carbide
- Work disk: stainless steel
- Spectral range: 10-8,000cm⁻¹
- Ergonomic one-finger clamp mechanism
- Pressure control
- Working distance (max. sample height) >20mm
- Easy cleaning due to the rotatable pressure applicator
- Exchangeable crystal plates (Diamond, Ge)
- Purgeable and sealed beam path
- Sample compartment cover adapted for Platinum-ATR-accessory
- Only for use TENSOR II

RFQ # ML173504 Spec Sheet

OPUS Spectroscopy Software

3

O/IR+

OPUS/IR, FT-IR Spectroscopy Software Package

OPUS is an integrated spectroscopy software for laboratory and process control.

OPUS is easy to use:

- Configurable user interface and access to executable functions
- Automatic consistency-test of measurement parameters
- Multi Tasking: Measurement and data manipulation/evaluation at the same time
- Automated atmospheric correction for water vapor and CO₂ in MIR without the need for reference spectra

OPUS delivers reliable results in a short time:

- Single and repeated measurements, auto sampler support
- Many interactive functions for comfortable data processing and evaluation, e.g.
 - Normalization, calculate derivative and average spectra, spectra subtraction
 - Spectrum calculator
 - Curve fit
 - Peak Pick
 - Spectra interpretation tool
 - Quick Compare spectra
 - Search spectra in a library, create your own libraries
 - Free starter library
 - Analyze peak areas and heights, quantitative analysis (Lambert-Beer's Law)
 - Automated multi step evaluation of spectra (MultiEvaluation)
- Predefined print layouts, customizable print layouts
- Conversion of files to different file formats (eg JCAMP)
- Easy data export to other programs

OPUS is a validated software and supports the validation of the spectrometer:

- Automated OQ and PQ testing
- Permanent instrument status indicator, online monitoring of system performance

OPUS is compliant to cGMP/GLP:

- Multi level user management, log-in with user name and password
- Audit trail (history log function)
- All data, incl. manipulation and evaluation results, stored in ONE file
- Electronic signature of spectra and methods

OPUS supports user during daily routine work:

- Run, create and edit macros and VB scripts
- Automated execution of repeated actions via calendar
- Lab journal functionality
- Online help
- Multimedia FT-IR tutorial

Item

4

O/SR-NP

OPUS/SEARCH, time-limited offer

for Software Package for comprehensive search functionality in spectra libraries
Completes the basic Search functions in OPUS with

- Mixture analysis: Identifies and quantifies single components in mixture spectra. To visualize the quality of the match a composite spectrum from the library component spectra and the difference spectrum between composite and query spectrum (=residual) are calculated.
- Peak search: Search of user defined peak tables. Includes intuitive set-up of peak tables by interactive peak pick on one or several reference spectra.
- Information search: Powerful and intuitive search of terms and numbers in the complete information matrix of one or several spectral libraries. Includes option for advanced info search for accurate discovery of specific information.
- Unlimited set-up and editing of user spectra libraries. The user is guided through an intuitive set-up procedure. Contains the option to import info tables from external programs by copy & paste.

RFQ # ML173504 Spec Sheet

Data Systems

- 5 CS81/25+
Data system, Ultra Slim desktop
"Intel" Core 2 Duo processor, >3GHz, 4GB RAM
250GB HDU or better, 8xDVD/Lightscribe Drive, 21.5" TFT display.
Ports: USB 2.0 (10x), PS/2 (2), RJ-45 Network (1 + 1 USB-Ethernet Adapter),
VGA, DisplayPort, line in, line out, mini PCIe.
Expansion: only for one m-PCIe card, MXM(graphics) and m-SATA(disk).
Operating System: Windows 7 Ultimate or better.

Services with orders

- 6 S950+
Installation on-site
Included in the price of the system
(including travel charges, inland)

Services and Support

- 7 S881
Warranty Extension to 10 Years for Interferometer
Covers replacement of defective parts of the scanning mechanism of the
interferometer. The warranty starts with delivery of the spectrometer.
- 8 S881-L
Warranty Extension to 10 Years for laser
Covers parts in case of laser defects.
The warranty starts with delivery of the spectrometer.
- 9 S882-P
Warranty Extension to 10 Years
for Platinum ATR A220/Dx or A225/Qx
Covers material and labor costs in case of potentially necessary repairs in the
factory.
Defects resulting from improper operation are excluded from this.
The warranty starts with the delivery of the accessory.