







SCIGATE AUTOMATION (S) PTE LTD

No.1 Bukit Batok Street 22 #01-01 Singapore 659592

Tel: (65) 6561 0488 Fax: (65) 6562 0588 Email: sales@scigate.com.sg Web: www.scigate.com.sg

Business Hours: Monday - Friday 8.30am - 6.15pm

LUPHOScan

Fast non-contact 3D form measurement of aspheric optics



Your turn-key solution for ultra precision metrology



Content LUPHO Scan



Maximum flexibility with LuphoScan technology.......07

LuphoScan platforms are interferometric, scanning metrology systems based on MWLI® technology (multi-wavelength interferometry). They are designed to perform ultra precision non-contact 3D form measurements mainly of rotationally symmetric surfaces such as aspheric lenses.

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Applications	

LuphoScan systems offer crucial benefits with regard to 3D form measurements of high quality optical surfaces

- Investigation of any rotationally symmetric surface Aspheres, spheres, flats and slight freeforms
- Ultra high, reproducible accuracy
 ≤ ± 50 nm
- Almost every material

 Transported specific and additional additional and additional and additional addition

Transparent, specular, opaque, polished, ground

• Large spherical departures

Unrestricted, e.g. can measure pancake or gullwing surfaces, and profiles with points of inflection

• Steep slopes

Highly flexible*

Measures segmented surfaces, annular optics, rectangular surfaces, surfaces with diffractive structures, axicons

• Complete lens characterisation*
Lens thickness, wedge error, decentre error, lens-mount positioning

Diameters

Up to 120 mm, 260 mm, or 420 mm

Fast measurement speeds

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E.g. 1:58 min (\varnothing = 30 mm, Roc = 60 mm, 100 points / mm²), or 5:29 min (\varnothing = 130 mm, Roc = 150 mm, 50 points / mm²)
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*Add-ons, see pages 8-11



Serving a global market

Taylor Hobson is world renowned as a manufacturer of precision measuring instruments used for inspection in research and production facilities. Our equipment performs at nanometric levels of resolution and accuracy.

To complement our precision manufacturing capability we also offer a host of metrology support services to provide our customers with complete solutions to their measuring needs and total confidence in their results.

Contracted services from Taylor Hobson

Sales department

 ${\it Email:} \ {\it taylor-hobson.sales@ametek.com}$

Tel: +44 (0)116 246 2034

- Design engineering special purpose, dedicated metrology systems for demanding applications
- Precision manufacturing contract machining services for high precision applications and industries

Service department

 ${\it Email:} \ {\it taylor-hobson.service@ametek.com}$

Tel: +44 (0)116 246 2900

 Preventative maintenance protect your metrology investment with an Amecare support agreement

Centre of Excellence department

Email: taylor-hobson.cofe@ametek.com

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- Inspection services
 measurement of your production parts by
 skilled technicians using industry leading
 instruments in accord with ISO standards
- Metrology training practical, hands-on training courses for roundness and surface finish conducted by experienced metrologists
- Operator training on-site instruction will lead to greater proficiency and higher productivity
- UKAS calibration and testing certification for artifacts or instruments in our laboratory or at customer's site



Taylor Hobson UK

(Global Headquarters)
PO Box 36, 2 New Star Road
Leicester, LE4 9JQ, England
Tel: +44 (0)116 276 3771 Fax: +44 (0)116 246 0579
email: taylor-hobson.uk@ametek.com



Taylor Hobson France

Rond Point de l'Epine Champs Batiment D, 78990 Elancourt, France Tel: +33 130 68 89 30 Fax: +33 130 68 89 39 taylor-hobson.france@ametek.com



Taylor Hobson Germany

Postfach 4827, Kreuzberger Ring 6 65205 Wiesbaden, Germany Tel: +49 611 973040 Fax: +49 611 97304600 taylor-hobson.germany@ametek.com



Taylor Hobson India

1st Floor, Prestige Featherlite Tech Park 148, EPIP II Phase, Whitefield, Bangalore – 560 006 Tel: +91 1860 2662 468 Fax: +91 80 6782 3232 taylor-hobson.india@ametek.com



Taylor Hobson Italy

Via De Barzi 20087 Robecco sul Naviglio, Milan, Italy Tel: +39 02 946 93401 Fax: +39 02 946 93450 taylor-hobson.italy@ametek.com



Taylor Hobson Japan

3F Shiba NBFTower, 1-1-30, Shiba Daimon Minato-ku Tokyo 105-0012, Japan Tel: +81 (0) 3 6809-2406 Fax: +81 (0) 3 6809-2410 taylor-hobson.japan@ametek.com



Taylor Hobson Korea

#310, Gyeonggi R&DB Center, 906-5, lui-dong Yeongtong-gu, Suwon, Gyeonggi, 443-766, Korea Tel: +82 31 888 5255 Fax: +82 31 888 5256 taylor-hobson.korea@ametek.com



Taylor Hobson China Beijing Office

Western Section, 2nd Floor, Jing Dong Fang Building (B10) No.10, Jiu Xian Qiao Road, Chaoyang District, Beijing, 100015, China Tel: +86 10 8526 2111 Fax: +86 10 8526 2141 taylor-hobson.beijing@ametek.com



Taylor Hobson China Shanghai Office

Part A,1st Floor, No.460 North Fute Road, Waigaoqiao China (Shanghai) Pilot Free Trade Zone, 200131 Tel: +86 21 5868 5111-110 Fax: +86 21 5866 0969-110 taylor-hobson.shanghai@ametek.com



Taylor Hobson Singapore

AMETEK Singapore, 10 Ang Mo Kio Street 65 No. 05-12 Techpoint, Singapore 569059 Tel: +65 6484 2388 Ext 120 Fax: +65 6484 2388 Ext 120 taylor-hobson.singapore@ametek.com



Taylor Hobson USA

1725 Western Drive West Chicago, Illinois 60185, USA Tel: +1 630 621 3099 Fax: +1 630 231 1739 taylor-hobson.usa@ametek.com



www.taylor-hobson.com

