



LASER THEODOLITE

# DT-110L

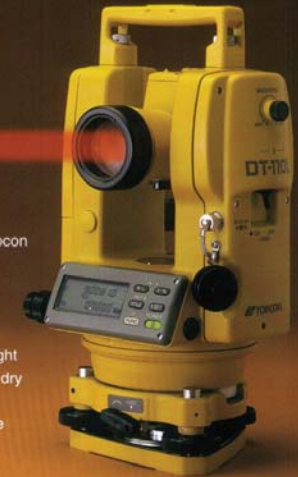


Topcon opens the door to the 21st Century In the latest technology of Laser Theodolite with the Introduction of the DT-110L.

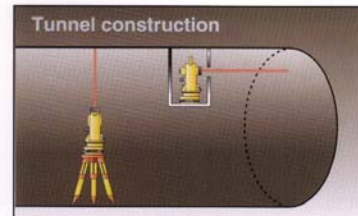
Since the introduction of our Waterproof DT-100 Series Digital Theodolite, Topcon has incorporated the same concept in our NEW DT-110L Laser Theodolite. The DT-110L is suitable for wet and damp conditions such as underground tunnel applications.

Our laser diode technology replaces the conventional helium neon laser tube. The benefit of using a laser diode in the DT-110L is the compact and light weight design and the instrument consumes less power. The DT-110L is powered by dry cell batteries that last up to 28 hours when only using the laser.

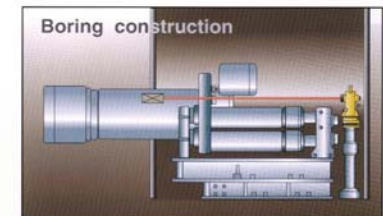
The NEW TOPCON WATERPROOF DT-110L is the most efficient and reliable laser theodolite for the professional engineer.



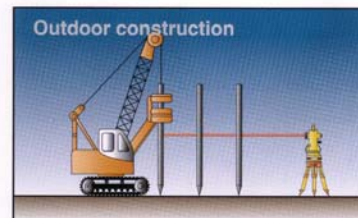
## Field Applications



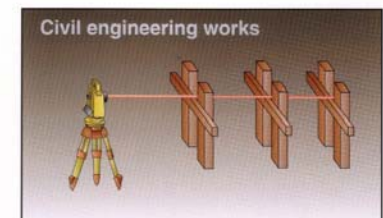
Setting control points and known points



Control boring machine



Vertical setting of steel columns/Plumbing  
Vertical lines



Grade control



## Feature Benefits To Increase Work Productivity

### 1 Waterproof

TOPCON's new Laser Theodolite DT-110L can stand up to any "Wet-Weather" conditions that occur on the job site (IPX-6). This makes the DT-110L particularly suitable for use in damp tunnel conditions where a laser theodolite is the perfect tool.

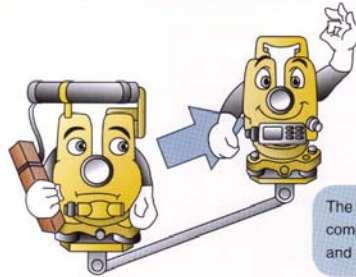


### 2 Longer Use With Dry Battery

※The laser diode is powered by 4 AA batteries



### 3 Compact & Light Weight



The DT-110L is extremely compact in size for portability and it weighs only 4.3 kg.

### 4 360° Rotating Telescope



### 5 Simple Operation & High Reliability

TOPCON has combined precise measurements in a functional package which is so easy to operate that anyone on the site can use it without the need of special training.



TOPCON uses a laser diode for longer laser life and reliability. A TOPCON laser diode is more convenient to use and easier to maintain than a He-Ne laser.

## SPECIFICATIONS

DT-110L (LASER)		DT-110L Angle Measurement	
Light source	LD	Method	Incremental reading
Wave length	633nm	Detecting	Horizontal : 2 sides
Laser class	Class 2		Vertical : 1 side
Laser diameter		Minimum reading	5"/10"
	5m 0.2mmφ		(1mgon/2mgon)
	20m 0.8mmφ	Accuracy *1	5"
	50m 2mmφ	Level Sensitivity	
	100m 4mmφ	Plate level	40"/2mm
	200m 10mmφ	Circular level	10'/2mm
	300m 12mmφ	<b>Compensator</b>	
<b>(THEODOLITE)</b>		Tilt sensor	Automatic Vertical compensator
<b>Telescope</b>		Compensating range	±3'
Length	149mm	<b>Power Supply</b>	
Objective Lens	40mm	Battery	4 AA batteries
Magnification	30X		
Image	Erect		
Field of view	1°30'	Operating time	28hrs Laser use Only
Resolving power	2.8"		11hrs Laser & Angle use
Minimum focus	1m	<b>Others</b>	
Stadia constant	—	Tribrach type	Detachable
Stadia ratio	—	Instrument height	176mm
<b>Optical Plummet Telescope</b>		Tangent screw	One speed
Magnification	3X	<b>Water Protection</b>	
Field of view	5°	Water proof	
Focusing range	0.5m~∞	Standard *2	IPX6

\*1 Standard deviation based on DIN 18723  
\*2 Standard based on IEC529

#### STANDARD SET COMPOSITION

DT-110L (with lens cap), Carrying case, Plumb Bob, Tool kit with case, AA battery, AC/DC converter, Silicon cloth, Instruction manual

#### OPTIONAL ACCESSORIES

Diagonal eyepiece 13, Trough compass 5, Battery Pack BT-35, Battery Charger BC-26B, Power Cable PC-16

\* Designs and specifications herein are subject to change without notice.

**Important** In order to obtain the best results with this instrument, please be sure to review all user instructions prior to operation.

**Tomas Technology Pte Ltd**  
7 Toh Guan Road East #08-10  
Alpha Industrial Building  
Singapore 608599  
Tel : 65-6284 0029  
Fax: 65-6285 4660



75-1 Hasunuma-cho, Natsushima, Tokyo 114-8501, Japan Phone: 3-3058-2000 Fax: 3-3060-4214 www.topcon.co.jp

**TOPCON AMERICA CORPORATION**  
CORPORATE OFFICE  
37 West Century Road, Paramus, New Jersey 07652, U.S.A.  
Phone: 201-261-9400 Fax: 201-261-2710 www.topcon.com

**TOPCON CALIFORNIA**  
2300 Industrial Blvd., Suite 105, West Sacramento, CA 95691, U.S.A.  
Phone: 916-374-4675 Fax: 916-374-6339

**TOPCON MIDWEST**  
801 Bunker Road, Elk Grove Village, IL 60007, U.S.A.  
Phone: 847-734-1700 Fax: 847-734-1712

**TOPCON LASER SYSTEMS, INC.**  
5709 West Las Plumas Blvd., Rosemead, CA 94688, U.S.A.  
Phone: 909-460-1300 Fax: 909-460-1310 www.topconlaser.com

**TOPCON EUROPE B.V.**  
Elaak Blaan 11, 2908 LJ Capelle a/d IJssel, The Netherlands.  
Phone: 0110-400077 Fax: 0110-488045 www.topcon-europe.com

**TOPCON BELGIUM**  
Prenakker 8, 1705 Merelbeke, Belgium  
Phone: 053-57 46 48 Fax: 053-57 46 79

**TOPCON DEUTSCHLAND G.m.b.H.**  
Hakenstr. 7, 47877 Melle, Germany  
Phone: 02154-1000 Fax: 02154-928-111 Telex: 8331981 TOPC D

**TOPCON S.A.R.L.**  
104106, Rue Remy 90300, Lavallée-Perret, France.  
Phone: 01-4106-9444 (MEDICAL) 1-4106-9400 (TOPOGRAPHIE)  
Fax: 01-47360201

**TOPCON ESPAÑA S.A.**  
Frederic Monjo 5, 08960, Sant Just Desumers Barcelona, Spain.  
Phone: 93-473-4957 Fax: 93-473-3932

**MADRID OFFICE**  
Avenida Ciudad de Barcelona 81, 1 Planta 28007, Madrid, Spain  
Phone: 91-552-4180 Fax: 91-552-4161

**TOPCON SCANDINAVIA A. B.**  
Industriaven 4 P. O. Box 2140 43032 Svalövsten Sweden.  
Phone: 031-961002 Fax: 031-268607 Telex: 21414

**TOPCON (GREAT BRITAIN) LTD.**  
HEAD OFFICE  
Crested House, London Road, Hursley Green, Eastleigh/H19 TOP, UK.  
Phone: 01505-860001 Fax: 01505-860022

**TOPCON SINGAPORE PTE. LTD.**  
Henderson Industrial Road # 402-15, Fairway Road, Singapore 119491  
Phone: 2780227 Fax: 2733540 E-mail: topcon@singnet.com.sg

**TOPCON AUSTRALIA PTY. LTD.**  
418 Victoria Road, Goswami, NSW 2111, Australia  
Phone: 02-9617-4666 Fax: 02-9617-4654

**TOPCON INSTRUMENTS (THAILAND) CO., LTD.**  
77/62 Sino Sathorn Tower, 8th Fl.  
Kingshomburi Rd., Klongtoey, Klongtoey, Bangkok 10000 Thailand.  
Phone: 662-440-1102 Fax: 662-440-1108

**TOPCON INSTRUMENTS (MALAYSIA) SDN. BHD.**  
Lot 226 Jalan Negara 2, Pusat Bandar Tamar Malawati,  
Taman Malawati, 53100, Kuala Lumpur, Malaysia.  
Phone: 03-4079790 Fax: 03-4079796

**TOPCON KOREA CORPORATION**  
Hyehong Bldg., 130-1, Seochu-Dong, Seocho-Gu, Seoul, Korea.  
Phone: 82-2-262-2211 Fax: 82-2-641-1348

**TOPCON OPTICAL (H.K.) LIMITED**  
2/F, Mexico Industrial Bldg., No. 53-55 Au Pui Wan Street, Fo Tan Road,  
Shaoh, N.T., Hong Kong  
Phone: 3690-1326 Fax: 2690-2221 E-mail: sales@topcon.com.hk

**TOPCON CORPORATION BEIJING OFFICE**  
Room No. 902 Pinyi Plaza Building, 14 Congmenmen Nanmen,  
Dongcheng District, Beijing, 100007, China.  
Phone: 8610-65219717 Fax: 10-6521-4160

**TOPCON CORPORATION BEIRUT OFFICE**  
P. O. Box 70-1000 Antares, BEIRUT, LEBANON  
Phone: 961-4-523254/54-14-523235 Fax: 961-4-523118

**TOPCON CORPORATION DUBAI OFFICE**  
Office No. 102 Khalaf Rashid Al Nayir Bldg., 240 Abu Hal Road, Deira, Dubai, UAE  
Phone: 971-4-6960111 Fax: 971-4-695272



Certificate No. Q1102  
TOPCON CORPORATION  
Surveying Instruments Division (Tokyo)



## 中嘉科技有限公司

台北市興隆路一段8號1樓(羅斯福路五段口)  
TEL: (02)2931-3939 FAX: (02)2931-0045  
網址: www.jungjia.com.tw

Printed in Japan 9909-30NA374-4 TS-AS-TAP