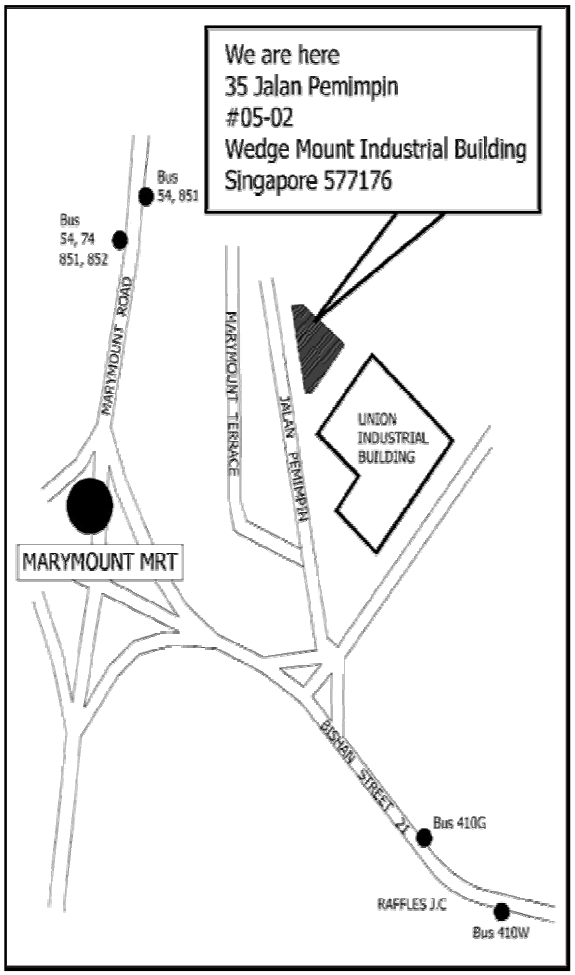
Location Map of GPS Lands Training Centre



*Take SBS Bus 410 [Green Plate] from Bishan Bus Interchange
Alight at Raffles Junior College Bus Stop
* Alternatively, the nearest train station would be Marymount. (Walking distance about 5 Mins from bus-stop or train station to training centre.

Enrolment

Training Venue
GPS Lands Training Centre
No 35 Jalan Pemimpin #05-02,
Wedge Mount Industrial Building,
Singapore 577176
Tel: (65) 6354 5950
Fax: (65) 6354 5949

Application
Where the application period ends on a public holiday or a Sunday, the closing date for applications will be the first work day following the stated closing date.

Registration & Payment
Registration is confirmed upon payment. Cheque should be crossed and made payable to **"Singapore Institute of Surveyors & Valuers"** and mail it together with your completed registration form to **110 Middle Road #09-00 Chiat Hong Building, Singapore 188968.**

Withdrawal and Deferment
No refund will be made and no request for deferment will be granted unless a written notice is given no less than seven (7) days prior to the course commencement
SISV & GPS Lands reserve the right to amend the course details, revise the course fee without prior notice, to cancel, postpone or change the venue of the course in the event of any unforeseen circumstances.

Enquiries
Contact: Ms. Janet Han (janet@sisv.org.sg) /
Mr. Joe (jumain@sisv.org.sg)
Tel: (65) 6222 3030
Fax: (65) 6225 2453
Website: http//www.sisv.gov.sg

Contact: Ms Jasmine Lin (jasmine@gpslands.com)
Tel: (65) 6354 5950
Fax: (65) 6354 5949
Website: www.gpslands.com

Singapore Institute of Surveyors and Valuers

Course Conducted By:

GPS LANDS (SINGAPORE) PTE LTD

BASIC LAND SURVEYING COURSE

APPLICATIONS IN: BASIC LAND SURVEYING

Course Details

Introduction to Land Surveying

1. **Introduction**
   a) What is land surveying? Explain Plane & Geodetic Surveying. Field & Office Work.
   Use of surveying for boundary definition, for construction, horizontal control & vertical control.

   b) Engineering, cadastral, hydrographic & photogrammetric Surveys.

2. **Principles of Surveying**
   a) Concept of poiint location by:
   i. Trilateration
   ii. Offsets
   iii. Traversing
   iv. Intersection

3. **The Surveyor' Work**
   a) Verify/establish horizontal & vertical controls
   b) Location/ refixing the positions of boundary marks in a cadastral survey
   c) Carry out a topographical survey
   d) Horizontal & Vertical monitoring of structures, dams, tunnels etc
   e) Carry out a pre-computation for a setting out survey
   f) Setting out building corners, roads, drains etc

4. **Equipment**
   a) Measurement of distance: tapes, chains, edmi
   b) Measurement of angles/bearings: theodoites, total stations, robotic system
   c) Measurement of N,E,Z coordinates: GPS, Total station

5. **Field Procudure**
   a) Working from whole to part
   b) Recce
   c) Planning & obtaining datum for survey
   d) Observation & recording

COURSE DURATION: 12 Hours

Horizontal Control Survey

1. **Establishing horizontal controls using total station &./ or GPS**

   a) Controls for setting out/traverses
   b) Concept of true north, grid north, bearings, angles etc
   c) Linear measurement with tapes, chains, edmi
   d) Accuracies & errors in linear measurements
   e) Method of measuring angles, bearing & their associated errors & accuracies

2. **Traverses**

   a) Open & close traverses
   b) Datum to commence survey
   c) Cadastral survey traverse & connection to ISN marks

3. **Computations**

   a) Linear Misclose
   b) Precision & Accuracy
   c) Adjustments: Bowditch Rule, Transit Rule & Least Square
   d) Calculate setting out data
   e) Calculate area & volumes
   f) Calculate clearances, distance, angles, coordinates

COURSE DURATION: 48 Hours

ENTRY REQUIREMENTS
(1) Minimum of 1 GCE "O" Level credit; OR
(2) 3 GCE "N" Level; OR
(3) NITEC

Vertical Control Survey

1. **Ordinary levelling:**

   a) Basic knowledge & Equipment
   b) Principle of finding
   c) Booking, calculations & checks
   d) Accuracy, precision & errors
   e) Adjustments

2. **Perrmanent adjustment**

3. **Applications of levelling:**

   a) Long & cross sections
   b) Contouring
   c) Setting out proposed levels
   d) Monitoring of settlement markers

COURSE DURATION: 18 Hours

Course Fee: S$1,300 (SISV Member)
S$ 1,500 (SISV Non-Member)
SDF Assistance: S$156*
(* Terms and Conditions Apply)
Total Duration: 78 Hours
(2 week nights of 3 hrs each + 1 Saturday 4 hrs)

Note:
(i) Course Fees inclusive of training materials
(ii) Min 12 Pax to start course
(iii) Course Fees exclude GST
(*) Companies sponsoring eligible employees are required to register online via **SkillsConnect**.
Homepage: **http//www.skillsconnect.gov.sg**