

# Professional Land Surveys Ltd

**Chartered Land Surveyors** 

Experts in Geospatial Measurement & Mapping

Professional Land Surveys (PLS) is a Chartered Land Surveying company regulated by the Royal Institution of Chartered Land Surveyors (RICS). We are dedicated to delivering quality surveying services, safely, on-time and in a cost-effective manner.





# **Our Services**



# **TOPOGRAPHICAL & ENGINEERING SURVEYS**

- Large and small-scale surveys in all environments.
- As-built surveys.
- Highway Surveys.
- Lease Plan and boundary surveys.
- Dimensional control surveys.
- Volumetric/ Cut and Fill analysis.
- 3D Modelling.

PLS will undertake land surveys small and large (from a single plot to large multi-acre developments) across the UK and further afield. Utilising the most cost-effective solutions, PLS will also ensure that clients receive the products at the accuracy and detail they require.

GNSS, Total Stations, Laser Scanning, LIDAR and Unmanned Aerial Vehicles (UAVS) are among the technologies that could be utilised to acquire geospatial data for our client's projects.

Surveys can be delivered in a variety of formats and to specifications including:

- Client provided specifications
- RICS specification
- PLS's own in-house specification

### **BOUNDARY SURVEYS**

Professional Land Surveys (PLS) are Chartered Land Surveyors and are regulated by the Royal Institution of Chartered Surveyors.

PLS offer an initial free telephone consultation if you think you have a boundary or right of way problem with a neighbour.

If you then want to proceed further we then offer a site consultation of approximately one hour to discuss the problem, look at the site and study any documentation. Some basic measurements might be taken if necessary. An opinion will be given at the end of the consultation with regards to how we feel you should deal with the problem.

A fixed fee will be quoted for this and for any subsequent surveying work/consultation.

Accurate site surveys can be undertaken and boundary demarcation if required. Reports can be produced which will be acceptable in a court of law.

Additionally, we can provide an expert witness who can testify in a court of law.

# PROFESSIONAL CONSULTANCY

PLS is chartered survey company and is regulated by the RICS. We will be happy to provide professional consultation and advice relevant to many areas covering land surveying and measurement and mapping.

Some examples include:

- Help defining survey specifications for projects and procuring survey work.
- Project management management of large/small surveying projects including best practice and methodology.

- Advice on different surveying methodology to give you exactly the product you require at the right accuracy and best price.
- Continuing professional development (CPD) seminars – PLS are happy to present to companies and provide the latest insights into survey technology, best practice and procuring survey work at a time that works for you.

# **Our Services**



# MEASURED BUILDING SURVEYS

PLS can produce accurate measured building information for purposes such as:

- Property Area Measurement measurement of the floor area to RICS specifications and standards using both the RICS code of Measuring Practice (Gross External Area (GEA), Gross Internal Area (GIA) and/or Net Internal Area (NIA) can be provided) and the new International Property Measurement Standards (IPMS).
- Elevation Surveys elevation surveys of simple to highly complex ornate buildings.

- Building floor plans- extensive measured building surveys can be provided to RICS specifications, the clients own specification or PLS can provide a standard specification.
- 3D CAD models and visualisations techniques such as photogrammetry and laser scanning allow data to be captured rapidly on site. Following the field work accurate as-built models of any structure can be created using innovative modelling techniques. Models can include 3D Revit models for BIM.

# LASER SCANNING & 3D MODELLING

Laser scanning offers a rapid, accurate and safe method Survey outputs include the following: of collecting comprehensive 3D information about any structure or building. Collection of site data can be recorded to an accuracy of +/- 3mm.

PLS have a large amount of experience in carrying out and managing laser scanning projects.

- Colourised point cloud models for the purposes of visualisation and fly-throughs
- 2D and 3D CAD plans including building elevations
- 3D Revit models for Building Information Modelling (BIM)
- Online photography which can be used for measurement and visualisation purposes

# **ENVIRONMENT AGENCY (EA) COMPLIANT WORK**

PLS are experienced and competent in producing surveys compliant with the Environment Agencies (EA) National Standard Contract and Specifications for Surveying Services.

Surveys compliant with the EA specification PLS can provide include:

- Survey Control installation horizontal and vertical control using methods such as GNSS and spirit levelling. Stations of various grades can be provided dependent on client requirements. Deliverables include station pro-forma diagrams and survey reports.
- Topographic Surveys.
- Flood bank levels accurate level information and 2D positions on the lowest points along flood defences running alongside channels, rivers and lakes.

Channel Surveys including:

- Open Channel Cross-sections
- Structures including bridges, culverts, weirs and gauge boards
- 3. Long Sections

Deliverables can include:

- 1. Sections in CAD and PDF format
- 2. **EACSD** format
- 3. ISIS (flood modeller)
- 4. Photography of all cross-sections
- Building Threshold Surveys Accurate threshold surveys of buildings using spirit/digital levelling techniques to +/- 10mm in accuracy to the Ordnance Survey level datum.

# **Our Services**



## **DEFORMATION MONITORING**

Deformation monitoring is the systematic measurement and tracking of the alteration in the shape or dimensions of an object such as building or structure as a result of stresses induced by applied loads. Advances in software and instrumentation now enable PLS to provide both traditional manual monitoring systems to fully automated 24/7 active installations with real time data being continuously uploaded.

PLS will advise on and provide the most cost effective service – depending on your project requirements.

# **UTILITY SURVEYS**

Utility Surveys will be carried out in accordance with PAS The deliverable will be in the form of records overlaid 128:2014 specification for underground utility detection, verification and location published by BSI.

Survey Types:

Type D: Desktop utility records search

A report identifying all known utility owners and their assets within an area including a list of affected and non-affected providers, long with plans, maps and diagrams provided.

Type C: Site Reconnaissance

Accompanied by a desktop report (type D) – it will involve a site reconnaissance visit to identify features that may indicate the presence of a service such as manholes, valves, utility markers, street furniture and excavation scars.

onto existing survey or OS base plans.

Type B: Detection

Accompanied by a desktop utility report (type D). This survey is a non-penetrative survey conducted using geophysical techniques such as electromagnetic detection and Ground Penetrating Radar (GPR). Deliverables will be in the form of an AutoCAD file accompanied by a written report and photographic record.

Type A: Verification

This survey can improve the confidence level of service location and types by actual visual inspection via access points such as manholes or by excavation ad exposure.

### **VERIFIED VIEW SURVEYS**

A verified view is a render of a 3D model representing a proposed development, placed accurately within a photograph of the prospective site.

PLS have a wealth of experience in this area and can provide accurate survey information with regards to the reference points and the camera locations for a verified view. Deliverables will include:

- A comprehensive co-ordinate listing and survey report including point descriptions and the horizon level
- Individual survey images displaying the actual surveyed points
- Marked up imagery in CAD and PDF format showing individual surveyed points and the horizon line (if required)
- 3D plans positions in CAD and KMZ (Google Earth) format

# **About Us**



Professional Land Surveys (PLS) is a Chartered Land Surveying company regulated by the Royal Institution of Chartered Land Surveys (RICS). We are dedicated to delivering quality surveying services, safely, on-time and in a cost-effective manner.

The company is owned and managed by Mark McGarragh – a Chartered Land Surveyor with over 23 years of experience in the Land Surveying/Geomatics profession.

PLS utilise technologies such as Global Navigation Satellite Systems (GNSS), high quality imaging total stations and laser scanning (terrestrial and mobile). All acquired data is processed in industry standard software – to provide our clients with the highest quality products.

Safety is a top priority and all surveyors have CSCS cards as standard, are provided with the correct and appropriate PPE and training necessary to undertake survey work in a safe manner on all sites.

PLS can work throughout the UK and abroad.

#### **OUR MISSION:**

PLS's mission is to:

- Be safe always.
- · Act professionally at all times.
- Consistently deliver high quality products.
- Provide an exemplary service to our clients through clear and concise communication.
- Establish innovative methods of data acquisition and processing – passing costs savings onto our clients.
- Work with passion and as a team.

### **OUR SERVICES:**

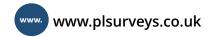
- Topographical & Engineering Surveys
- Boundary Surveys
- Measured Building Surveys
- Laser Scanning
- 3D Modelling
- Professional Consultation
- EA Compliant Work
- Verified View Surveys
- Utility Surveys
- Deformation Monitoring













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