

## **Facts You Should Know About Having Your Land Surveyed**

### ***When is a Survey Usually Required?***

Before title to land is conveyed, it is necessary to have an accurate description of the property for the deed, including an accurate determination of the acreage. It is also important to have an accurate determination of the acreage of the lot and to know if there are any physical features or title overlaps which might constitute encroachments or, in some other way adversely affect the title to the land. Only an up-to-date survey, by a *Professional Land Surveyor*, can give you this information. Most North Carolina cities and counties have subdivision ordinance procedures which must be followed. For any subdivision, the *Professional Land Surveyor* can work with you to prepare the required maps. This may be a simple procedure, requiring only a boundary survey and subdivision plat. In more complicated cases, additional surveys, including a topographical survey, a site analysis, road and lot layout plans and erosion control plans may be necessary. The *Professional Land Surveyor* will prepare the necessary preliminary plans for agency review and the final subdivision plat for recordation. The *Professional Land Surveyor* can explain the requirements of the local Subdivision Ordinance and assist you in getting the necessary approvals for your development. Before land is improved by constructing drives, fences, walls or buildings, it is desirable to know the location of the property corners and boundaries. Using the services of a *Professional Land Surveyor*, for staking the locations of grading and improvements, avoids encroachments upon adjoining property and possible litigation at a later date. It also increases the likelihood that the improvements will be constructed according to the design plans. Before land is partitioned by will or by Court Order, a survey of the land is needed. In the case of a will, the boundary of the property and the improvements on the property, including buildings, roads and drives, will need to be located. Then, when the land is divided, the heirs can easily decide on the location of the new dividing lines. When a question arises as to the location of a boundary line between you and your neighbor, the first thing you need to do is get an accurate boundary survey. When the survey is completed, the *Professional Land Surveyor* can explain the location of the boundary line. In some cases, the surveyor can help solve the problem between you and your neighbor; at other times, the surveyor will appear in court as an expert witness on your behalf.

### ***What the Professional Land Surveyor needs from you...***

The *Professional Land Surveyor* needs your name, current address & phone number, and the name of the current landowner, the Parcel Identification Number (PIN) or the property, and the deed book and page number of the current deed. Any other information you have, such as deeds, wills, or maps, may be helpful. It is not necessary for you to search for or get copies of the neighbors' deeds. The *Professional Land Surveyor* is an expert at this research and is required to do so by the Standards of Practice. A written authorization with a retainer may be required for certain surveys before the land surveyor will begin your survey.

### ***Why Survey Costs Vary...***

The *Professional Land Surveyor's* fee will include the time to search for deeds or court records, locate the physical boundary evidence at the property, make the necessary computations to check the boundary, place appropriate markers on the property, and prepare the survey map. The cost of the survey will vary because of missing corner evidence, disputed boundary lines, rough terrain, heavy underbrush, poor land descriptions, and travel time to and from the property. Because of these variables, it is difficult for the *Professional Land Surveyor* to predict an exact cost or when your survey may be completed. Depending on the *Professional Land Surveyor's* schedule and difficulty of work, the cost and completion schedule may need to be negotiated with the surveyor.

### ***Additional Information...***

A survey is a highly technical and complex service utilizing the art of measuring, mathematics, and the proper interpretation of real property law. A Title Insurance policy is generally issued when property is purchased. This covers: the title of the property, protecting the owner; or the loan, protecting the lender, it can also cover the survey if specified. Discuss the provisions of the title insurance with your lawyer. The *Professional Land Surveyor* can survey your land **ONLY** according to the deeds and other available information. The location of the boundary lines marked by the surveyor is **ONLY** a professional opinion based on the evidence found in the records and on the ground. However, the accuracy by which the *Professional Land Surveyor* accomplishes this service is backed by his professional integrity. In the case of litigation, the *Professional Land Surveyor* will appear in court as an expert witness. The surveyor's testimony is accepted by the court as professional evidence. A seller, real estate agent or timber cruiser may claim to know the boundary of a parcel. Accepting their representations is at best a gamble and at worst a pending lawsuit. Only a *Professional Land Surveyor* can provide reliable information about the location of your property lines.

You will probably require the services of a land surveyor only a few times during your life. The need usually arises when you buy a house, a lot, or a larger tract of land. If you are a lawyer, engineer, architect, realtor, developer, or work for a utility company or any state or local government agency, then you will probably need the services of a Professional Land Surveyor many times. Since any transaction involving land represents a large and important investment, the North Carolina Society of Surveyors, Inc., has prepared this pamphlet so you may understand the necessity for land surveying services, how they can benefit you, and the various types of surveys you may need.

### ***Selecting a Professional Land Surveyor***

When it is determined that a land survey is needed, only a *Professional Land Surveyor*, licensed by the North Carolina State Board of Examiners for Engineers and Surveyors (NCBEES), is legally permitted to survey land in North Carolina. Every *Professional Land Surveyor* **MUST** follow the requirements listed in the "Standards of Practice for Land Surveying in North Carolina." The State Board publishes these standards and the *Professional Land Surveyor* you hire can provide a copy upon request. The Standards of Practice lists everything the land surveyor **MUST** do during a survey and what **MUST** appear on the final survey map. It is best to select a *Professional Land Surveyor* by qualifications. A well-qualified land surveyor will take the time to ask you about your needs for the survey. The surveyor will then explain what is required to complete your survey, and will answer all of your questions in a helpful manner so that you understand the process. The *Professional Land Surveyor* is required each year to complete continuing education courses. He is also constantly reviewing and updating his field and office equipment in order to provide you with the best possible service.

### ***Types of Surveys...***

#### **BOUNDARY SURVEY:**

A survey of the boundary of a property according to the description in the recorded deed. Interior improvements such as buildings, drives, etc., are not located. Any improvements along the boundary affecting the use of or title to the property are located, such as fences, drives, utilities, buildings, sheds, streets, etc. Missing corner markers are replaced. A map showing the boundaries and improvements along the boundaries is prepared.

#### **LOCATION SURVEY:**

A boundary survey with the additional location of all the interior improvements. Missing corner markers are replaced. A map showing the boundaries and improvements is prepared. This type of survey may be required for the acquisition of a loan.

**TOPOGRAPHIC SURVEY:**

A survey locating improvements and topographic features such as elevations of the land, embankments, contours, water courses, roads, ditches, utilities, etc. This survey can be used in conjunction with a Location Survey in order to prepare a Site Design Map, a Subdivision Map, or an Erosion Control Plan.

**SITE PLANNING SURVEY:**

This survey uses a boundary and topographic survey as a base to design future improvements. It can be a design for a house, a residential subdivision, a store, a shopping center, a new street or highway, a playground, or any other planned development.

**SUBDIVISION SURVEY:**

This often includes a topographic survey of a parcel of land which will be divided into two or more smaller tracts, lots or estate division. This can also be used for site design of lots, streets and drainage. It is for construction and recording.

**CONSTRUCTION SURVEY:**

Using surveying techniques to stake out buildings, roads, walls, utilities, etc. This includes horizontal and vertical grading, slope staking, and final as-built surveys.

**GEOGRAPHIC POSITIONING SYSTEM:**

GPS surveys use portable receiving antennas to gather data transmitted from satellites which are used to calculate the position of the object being located on the surface of the earth. The receiving antennas can be miles apart and still obtain very accurate data. GPS surveys are used to establish coordinate control points for the State Plane Coordinate Systems, large boundary surveys, and subdivision surveys. It can also be used to collect data for Geographic Information Systems / Land Information Systems (GIS/LIS), such as the location of streets, homes, businesses, electric, phone & gas utilities, water & sewer systems, property lines' soil & vegetation types, water courses, etc. This data can be used in future planning, preservation and development.

**ALTA/ACSM SURVEY:**

This is a very detailed survey often required by lending institutions. The request for this survey must be in writing and be included with all of the deeds and easements affecting the property, along with the deeds to adjoining properties. A list of items to be located as noted in the ALTA/ACSM publication can be included.