

Legislation Proposal 2018

Georgia Code Title 43 Chapter 15 Professional Engineers and Land Surveyors

Three items that need to be addressed through legislation.

1. The use of the photogrammetric UAV to capture images and the automatic reduction of the data using offsite third-party processors has created a dangerous situation where our community's infrastructure is being built and designed from data produced without standards. The lack of standards, knowledge and expertise has produced erroneous maps. While these maps look good to the uneducated eye, they are inaccurate and have no place in the workflow of our community infrastructure. This has resulted in tax paying citizens being damaged by individuals who have essential immunity and an open field. This dangerous situation brings to surface a recognized flaw in the current code. The legal definition of land surveying in 43-15-2(6)(A) is hampered by qualifying language in the introductory paragraph: "in the evaluation and location of property rights". The word "and" has been interpreted to mean that in order for a professional service to fall under the definition, it must be both evaluation and location of property rights. And, the term: location of property rights" being vague, has been held to mean boundaries. Also, in 43-15-2(6)(F), the very subject matter is addressed but similarly hamstrung with the language "for evaluation or location of... boundaries". The end result is that unless a property boundary is directly and clearly involved in the professional service, the pursuance of otherwise obvious violations has not been able to progress. This is clearly contrary to the intent of the law, when read in context, and something that needs to be changed.
 - a. Replace the current definition (43-15-6) with the verbiage recommended by the National Council of Examiners for Engineering and Surveying (NCEES) model law(ML).
 - i. Amend the ML layout language to allow the layout of non-boundary related items.
 - b. Grandfather the practicing remote sensing scientist and photogrammetrists.
 - i. Those meeting the grandfathering clause must file an application by July 1, 2020 and meet the ML guidelines for grandfathering photogrammetrists.
 - ii. Amend the ML grandfathering language to include individuals who have obtained certification as a mapping scientist or photogrammetrist through the American Society or Photogrammetry and remote sensing, or who have been prequalified or recognized by GDOT as a photogrammetrist or mapping specialist, or other similar qualifications deemed acceptable by the Board.
 - iii. After July 1,2020, all applicants must follow the normal route to licensure without a special class of licensure or restrictions. No photogrammetrist or remote sensing scientist will be allowed licensure without meeting the requirements for licensure as set forth by the board.
 - iv. All grandfathered photogrammetrist will only be allowed to practice in the subsection that is relative to their expertise. Their application will include an affidavit where they agree to limit their practice and their license record as available to the public must be marked as "limited to photogrammetry and remote sensing"

2. The hydrology requirements (both the course work and the exam) have become a serious impediment to prospective surveyors entering the profession. This once widely practiced aspect of the profession has drastically declined due to the increased complexity of storm water technology, coupled with the ever-growing complexity and demand for traditional surveying services, and the declining number of municipalities that accept storm water design plans from surveyors. Making the education requirement optional would also relieve the colleges and universities offering surveying curriculum from the burden of providing the required engineering courses of hydrology and prerequisites, furthermore providing more opportunities to prospective surveyors. The recommended change in 43-15-12 and 43-15-13 would have no effect on the currently licensed surveyors and would leave them with the same scope of service that we now have. The change would come with new surveyors, giving them the option to take the required education and hydrology portion of the exam if they desired to practice “light engineering” as allowed by current code.
 - i. Amend the proposed ML definition to include the current hydrology language (43-15-2(6)(D) and reconstruct it to two subparagraphs.
 1. The design of subdivisions, grading plans, site plans, and erosion - sediment control plans (which would continue to be within the scope of practice for all surveyors)
 2. The design of detention ponds, storm water management plans, the extension of existing water piping and gravity sewers.
 - ii. Amend the educational requirement in 43-15-12(LSIT requirements) from quarter hours to 18 semester hours and remove the hydrology requirement.
 - iii. Include a new paragraph to the land surveyor in training certificate eligibility (43-15-12) that specifies: Land Surveyor in Training applicants may apply until July 1, 2020 with an alternate education requirement of 15 quarter hours of land surveying subject and 5 quarter hours in hydrology. Applicants applying before July 1, 2020 that meet the current requirements will be eligible for licensure without the hydrology education or exam.
 - iv. Include a new paragraph to the land surveyor certificate of registration eligibility (43-15-13) that specifies: To be eligible to engage in the design of detention ponds, storm water management plans, the extension of existing water piping and gravity sewers (the proposed new 43-15-2(6)(D).2) the following requirements must be met;
 1. Obtain licensure prior to July 1, 2018 or;
 2. Applicants applying after July 1, 2018 must obtain an additional 3 semester hours of coursework in hydrology, adequate experience and pass the hydrology exam; Their license record as available to the public must be marked as “hydrology/design authorized”
3. Replace “Land Surveyor” with “Professional Surveyor” in 43-15-2 and where applicable thereafter!

The summarized objectives are as follows:

1. Replace the current definition (43-15-6) with the verbiage recommended by the National Council of Examiners for Engineering and Surveying (NCEES) model law(ML) and grandfather the practicing remote sensing scientist and photogrammetrists.
2. Change the educational requirements to 18 semester hours and make hydrology an optional requirement for future applicants.
3. Rename the title of “Land Surveyor” to “Professional Land Surveyor”.