BOARD FOR ARCHITECTS, PROFESSIONAL ENGINEERS, LAND SURVEYORS, CERTIFIED INTERIOR DESIGNERS AND LANDSCAPE ARCHITECTS (APELSCIDLA)

Tuesday, February 11, 2025 – 10:00 a.m. 2nd Floor – Board Room 2

Department of Professional and Occupational Regulation 9960 Mayland Drive Richmond, Virginia 23233

Mission: Our mission is to protect the health, safety and welfare of the public by licensing qualified individuals and businesses enforcing standards of professional conduct for professions and occupations as designated by statute.

I. CALL TO ORDER

- a. Emergency Evacuation Procedures
- b. Determination of Quorum

II. APPROVAL OF AGENDA

III. APPROVAL OF MINUTES

- a. APELSCIDLA Board Meeting, November 13, 2024 (Page 3)
- b. Land Surveyor Section Meeting, November 13, 2024 (Page 11)
- c. Education Academy Committee Meeting, December 4, 2024 (Page 14)
- d. APELSCIDLA Board Meeting, December 4, 2024 (Page 16)
- e. Professional Engineers Land Surveyors Section Meeting, December 4, 2024 (Page 19)

IV. WELCOME AND INTRODUCTIONS

V. PUBLIC COMMENT PERIOD *FIVE MINUTE PUBLIC COMMENT, PER PERSON*

VI. CASE FILES

- a. Disciplinary
 - i. Consent Order 2024-01140 KJ. Worrell (Zmuda) (Page 21)
 - ii. Consent Order 2024-02812 Ildefonso Gonzalez (Kelly) (*Page 45*)
 - iii. IFF 2024-01469 Adam Werner (Nair & Kelly) (*Page 54*)
- b. Licensing
 - i. IFF 2025-00370 SE3, LLC (Jackson-Bailey) (*Page 154*)

VII. EDUCATION

- a. Examination Updates
 - i. Examination Statistics

VIII. NEW BUSINESS

- a. Executive Director's Update (Page 278)
- b. Regulatory Update
 - i. General Regulatory Review Update
 - ii. Guidance Documents (Pages 282, 286, 289)
- c. General Assembly Update

- d. Financial Disclosure Update
- e. New Licensee Celebration
- f. Interorganizational Council on Regulation Orientation

IX. OTHER BUSINESS

- a. Education Academy Committee Update
- b. Architects Update
- c. Professional Engineers Update
- d. Land Surveyors Update
 - i. VAS Town Hall, April 10-11, 2025
 - ii. NCEES Potential Mapping Science Examination Update
 - iii. Regulation of Drones Update
 - iv. LS Apprenticeship Draft Proposal (Page 292)
- e. Certified Interior Designers Update
- f. Landscape Architect Update
- g. Licensed Population (Page 311)
- h. Subsurface Utility Engineering Update
- i. EpicX Update
- j. A Day in The Life of a Land Surveyor
- k. Board Member Training

X. COMPLETE CONFLICT OF INTEREST FORM AND TRAVEL VOUCHER

XI. ADJOURNMENT

NEXT MEETING SCHEDULED FOR WEDNESDAY, MAY 7, 2025

- Agenda materials made available to the public do not include disciplinary case files or application files pursuant to §54.1-108 of the Code of Virginia.
- ❖ Five-minute public comment, per person, with the exception of any open disciplinary or application file.
- ❖ Persons desiring to participate in the meeting and requiring special accommodations or interpretative services should contact the Department at (804) 367-2785 at least ten days prior to the meeting so that suitable arrangements can be made for an appropriate accommodation. The Department fully complies with the Americans with Disabilities Act.

BOARD FOR ARCHITECTS, PROFESSIONAL ENGINEERS, LAND SURVEYORS, CERTIFIED INTERIOR DESIGNERS AND LANDSCAPE ARCHITECTS MEETING MINUTES

The Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects (APELSCIDLA Board) met on November 13, 2024, at the Department of Professional and Occupational Regulation (DPOR), 9960 Mayland Drive, Richmond, Virginia.

Members present for all or part of the meeting:

Professional Engineers Architects Erik Bootsma James Kelly

Tim Colley **Douglas Frost** Rick Townsend

Land Surveyors

Vickie Anglin Catherine Christian Stanley

John Claytor Kevin Shreiner

Landscape Architec

Susan Dibble Troy Arnold III Ann Stokes Justina Vasquez

Members absent from the meeting with regrets:

Architects Interior Designers Arjun Kainth

Staff present for all or part of the meeting were:

or a. Materials contained are not to Brian Wolford, Director Jeb Wilkinson, Chief Deputy Director Stephen Martin, Senior Advisor Tom Payne, CID Deputy Director Kate Nosbisch, Executive Director Ecila Williams, Licensing Operations Administrator Jhustyna McBride-Dunn, Regulatory Operations Administrator Joe Haughwout, Regulatory Affairs Manager Greg Emerson, Executive Director- Examinations Khang Le, Licensing Specialist

Elizabeth Peay, Assistant Attorney General with the Office of the Attorney General, was present.

APELSCIDLA Board Meeting Minutes November 13, 2024 Page 2 of 8

Steve Kirschner, LRPD Deputy Director, was not present at the meeting with regrets.

Members of the audience:
Georg Dahl, P.E., Virginia Society of Professional Engineers (VSPE) STEM and Educational
Outreach Lead for Tidewater/Hampton Roads Chapter
Chip Richardson, L.S., Accumark
Mark Pruett
Paige Pruett
Paul Battaglia, Architect, AIA Virginia
James Grove, P.E, University of Virginia
Caroline Alexander
Charlie Rice
Michael Zmuda, Virginia Association of Surveyors

Ms. Anglin, Chair, finding a quorum present, called the meeting to order at 10:08 a.m.

Call to Order

Ms. Anglin and Ms. Nosbisch advised the Board of the emergency evacuation procedures.

Emergency Evacuation Procedures

Ms. Stokes arrived for the meeting at 10:12 a.m.

Arrival of Board Member

Mr. Kelly moved to approve the agenda. Mr. Colley seconded the motion which was unanimously approved by: Anglin, Arnold, Bootsma, Claytor, Colley, Dibble, Frost, Kelly, Shreiner, Stanley, Stokes, Townsend and Vasquez.

Approval of Agenda

Mr. Bootsma moved to approve the minutes for the following dates:

Approval of Minutes

- APELSCIDLA Board Meeting, August 21, 2024
- APELSCIDLA Public Hearing, August 21, 2024

Mr. Shreiner seconded the motion which was unanimously approved by: Anglin, Arnold, Bootsma, Claytor, Colley, Dibble, Frost, Kelly, Shreiner, Stanley, Stokes, Townsend and Vasquez.

Ms. Nosbisch welcomed Jeb Wilkinson as the new Chief Deputy Director, Stephen Martin as the new Senior Advisor for the Agency, and Jhustyna McBride-Dunn as the new Regulatory Operations Administrator. Ms. Nosbisch informed the Board that Karen Reid, former Administrative Coordinator, left the Agency

Welcome/Introduct ions

APELSCIDLA Board Meeting Minutes November 13, 2024 Page 3 of 8

and she is currently seeking a replacement. Ms. Nosbisch introduced guests and staff of the audience.

Ms. Anglin read the following resolution for consideration by the Board:

Resolution for Caroline Alexander, Certified Interior Designer

Resolution for Caroline Alexander

WHEREAS, Caroline Alexander, did faithfully and diligently serve the Virginia Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects from 2016 to 2024;

WHEREAS, Caroline Alexander, did devote generously of her time, talent and leadership to the Board;

WHEREAS, Caroline Alexander, did endeavor at all times to render decisions with fairness and good judgement in the best interest of the citizens of the Commonwealth and these professions; and

WHEREAS, the Virginia Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects wishes to acknowledge its gratitude for devoted service of a person who is held in high esteem by the members of the Board and the citizens of the Commonwealth;

NOW THEREFORE BE IT RESOLVED, by the Virginia Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects this thirteenth day of November 2024, that Caroline Alexander be given all honors and respect due her for her outstanding service to the Commonwealth and its citizens; and

BE IT FURTHER RESOLVED, that this Resolution be presented to her and be made a part of the official minutes of the Board so that all may know of the high regard in which she is held by this Board.

APELSCIDLA Board Meeting Minutes November 13, 2024 Page 4 of 8

Resolution in Memory Of Robert (Bob) A. Boynton, Architect

Resolution for
Robert A. Boynton,
Architect
Posthumous

WHEREAS, Robert A. Boynton faithfully and diligently served as a member of the APELSCIDLA Board from October 1992, to September 1996; July 2000, to June 2003; July 2012, to June 2020; and

WHEREAS, Robert A. Boynton devoted generously of his time, talent and leadership to the APELSCIDLA Board; and

WHEREAS, Robert A. Boynton endeavored at all times to render decisions with fairness and good judgment in the best interest of the citizens of the Commonwealth and this profession; and

WHEREAS, the APELSCIDLA Board is grateful for the dedication and service of Robert A. Boynton to the Board and to the citizens of the Commonwealth; and

WHEREAS, the APELSCIDLA Board mourns the passing of Robert A. Boynton which occurred on August 31, 2024;

NOW THEREFORE BE IT RESOLVED, this thirteenth day of November 2024, that the APELSCIDLA Board expresses utmost regard and respect for Robert A. Boynton and his professional legacy which spans beyond the Commonwealth; and, so that all may know of the Board's depth of sorrow and its expression of sympathy, it is ORDERED this resolution be made a part of the official minutes of the Board and that a copy hereof be presented to the family of Robert A. Boynton.

Mr. Dahl, a Professional Engineer, addressed the Board with his concerns with the proposed legislation that relies on a "professional credential verification service" to establish equivalent qualifications for licensure for professional engineers from another country, which the language does not state validation of the other country's requirements meeting the Agency's requirements for licensure. He is requesting to require the international professional engineer to pass the PE licensing exam in conjunction with their professional engineer license from their respective country.

Mr. Pruett addressed the Board with his concerns regarding a complaint filed with the Agency regarding property line encroachment and his disappointment with the investigation process and the responses from the Agency. He is requesting the Board to appoint at least one director to work with him and his wife to assess the procedural and substantive issues with the Agency.

Public Comment
Period

APELSCIDLA Board Meeting Minutes November 13, 2024 Page 5 of 8

of discussion and position Ms. Pruett addressed Board with her concerns regarding a complaint filed with the Agency regarding property line encroachment and her disappointment with the investigation process and the responses from the Agency. Ms. Pruett addressed the Board stating that the Agency lacked procedural and investigative integrity and is requesting the Board to appoint a board member from the Board to meet with her to review the procedural and substantive issues with the Agency.

Mr. Richardson introduced himself to the Board as a licensed Land Surveyor, employed by Accumentation and in the second s employed by Accumark, Inc. and is willing to provide information and insight regarding Subsurface Utility Engineering.

Mr. Battaglia, Executive Vice President of AIA Virginia, addressed the Board regarding obtaining an architect license and his wishes for continued option for apprenticeship as an alternative pathway.

Mr. Graves, a Professional Engineer from the University of Virginia, expressed his concerns regarding quality control issues with the Agency's investigation team, as a complaint that was filed by Mr. Graves and was closed by the Compliance and Investigation Division, which Mr. Graves stated that he provided sufficient evidence and showed a conflict of interest.

Ms. Anglin passed the gavel to Mr. Arnold, Vice Chair, to chair the meeting for the disposition of the case.

Recusal of Board Member

Ms. Anglin recused herself from the meeting for discussion and deliberation of the file.

Regarding File Number 2024-02181, Holmes Smith, the Board members reviewed the Consent Order as seen and agreed by Mr. Smith.

File Number 2024-**02181, Holmes** Smtih

Ms. Dibble moved to accept the consent order which cites the following violation of the Board's Regulations: 18 VAC 10-20-380 C.10 (Count 1) and 18 VAC 10-20-380. C.17 (Count 2). For these violations, it was recommended that Mr. Smith pay the following monetary penalties: \$50.00 for Count 1, \$50.00 for Count 2, \$150.00 in Board costs, for a total monetary penalty of \$250.00. Mr. Colley seconded the motion which was unanimously approved by: Arnold, Bootsma, Claytor, Colley, Dibble, Frost, Kelly, Shreiner, Stanley, Stokes, Townsend and Vasquez

Ms. Anglin returned to the meeting.

Mr. Arnold passed the gavel to Ms. Anglin for the continuation of the meeting.

Return of Board Member

APELSCIDLA Board Meeting Minutes November 13, 2024 Page 6 of 8

Ms. Nosbisch provided an update regarding APELS examinations for informational purposes.

Examinations
Update

Ms. Nosbisch stated the Executive Director Report was provided for informational purposes only.

Executive Director Report

Ms. McBride-Dunn informed the Board that the General Review of Board for APELSCIDLA Regulations are now at the end of the NOIRA stage and currently preparing the filing for the proposed stage to submit the regulatory package for review on Town Hall

Regulatory Update

Ms. McBride-Dunn informed the Board that the fee adjustment action is at the proposed stage. Executive Branch review has been completed and the proposed fees was published in the *Virginia Register Volume 41*, *Issue 1* on August 26, 2024. The 60-day public comment period for the proposed fee adjustment started on August 26, 2024, and closed on October 25, 2024, with no public comments received. A public hearing was held on September 4, 2024, with no comments received.

Mr. Haughwout presented to the Board the proposed regulation for adoption of the final fee adjustment.

Mr. Claytor moved to approve the final fee adjustment. Ms. Vasquez seconded the motion.

After a discussion, it was unanimously denied by: Anglin, Arnold, Bootsma, Claytor, Colley, Dibble, Frost, Kelly, Shreiner, Stanley, Stokes, Townsend and Vasquez.

The Board has requested additional information and documentation for the proposed final fee adjustment.

Ms. Nosbisch discussed with the Board about Subsurface Utility Engineering and provided documentation from Mr. Richardson from Accumark. After a brief discussion between the Board and Mr. Richardson, it was determined that a meeting with the Professional Engineers and Land Surveyors is needed to discuss further and has been scheduled for December 4, 2024.

Subsurface Utility Engineering

Ms. Nosbisch reminded the Board that Financial Disclosure statements are due on February 1, 2025.

Financial Disclosure

Director Wolford and Chief Deputy Director Wilkinson exited the meeting at 11.30 a.m.

Departure of DPOR Staff

APELSCIDLA Board Meeting Minutes November 13, 2024 Page 7 of 8

Ms. Nosbisch provided an update on the Board Member Training Conference that occurred on October 10-11, 2024, for informational purpose.

Board Member
Training
Conference Update

Ms. Nosbisch informed the Board that the Regulations/Ethics Education Committee Meeting will occur on December 4, 2024, and consist of the following Board Members: Ms. Anglin, Mr. Claytor, Mr. Colley, Mr. Frost, Mr. Kelly, Ms. Stokes and Ms. Vasquez.

Regulations/Ethics
Education
Committee
Meeting

Ms. Nosbisch provided an update on the NCARB Leadership Institute in Washington, D.C, and the NCARB MBC/MBE Meeting, Fargo, ND, which was attended by Ms. Nosbisch and Mr. Colley, for informational purposes.

Architects Update

Mr. Kelly discussed with the Board the Mutual Recognition Agreement with NCEES and the UK, and the proof of competency, which addressed Mr. Dahl's public comment.

Professional Engineers Update

Ms. Nosbisch informed the Board that the VAS Fall Meeting occurred on September 27, 2024, in Arlington, VA. VAS has requested the land surveyor board members and executive director to participate in a Town Hall during their spring meeting on April 10-11, 2025.

Land Surveyors Update

Ms. Anglin requested the Board consider sending a memorandum be sent to NCEES requesting that they create a professional surveying Mapping Science exam. The Board was given a handout of a template of language for the request.

After discussion, Mr. Kelly moved to adopt the template for the Mapping Science Exam letter to NCEES with further revisions from Ms. Anglin. Mr. Shreiner seconded the motion which was unanimously approved by: Anglin, Arnold, Bootsma, Claytor, Colley, Dibble, Frost, Kelly, Shreiner, Stanley, Stokes, Townsend and Vasquez.

Ms. Nosbisch informed the Board that the Land Surveyors will be meeting after this board meeting to further discuss the usage of drones as it relates to surveying.

Ms. Nosbisch stated the CIDQ Annual Meeting occurred on November 7-9, 2024, which was attended by Ms. Nosbisch and Ms. Williams. Former Board Member, Ms. Alexander, was also in attendance and presented at the meeting.

Certified Interior Designer Section Update APELSCIDLA Board Meeting Minutes November 13, 2024 Page 8 of 8

Ms. Nosbisch informed the Board that she attended the CLARB ASLA and Licensure Summitt and the Annual CLARB meeting in September 2024.	Landscape Architect Update
Ms. Nosbisch gave an update to the Board regarding House Bill 2096, stating that the regulations are currently in development according to Town Hall and that the Board of Agriculture and Consumer Services unanimously approved the draft regulations at their May 23, 2024, meeting. The licensee counts as of October 1, 2024: APELSCIDLA Businesses 4,621 Architects 7,795 Professional Engineers 31,572 Land Surveyors 1,235 Land Surveyors B 57 Land Surveyor Photogrammetrists 92 Certified Interior Designers 482 Landscape Architects 997	Licensed and Certified Population
Ms. Nosbisch stated the financial statements were provided for informational purposes.	Financial Statements
Ms. Nosbisch informed the Board that EpicX is currently in development with a Wave 1 launch in March 2025.	EpicX Update
Conflict of Interest forms and Travel Vouchers were completed by all Board members present.	Conflict of Interest Forms / Travel Vouchers
There being no further business, the meeting was adjourned at 12:13 p.m.	<u>Adjourn</u>
Vickie McEntire Anglin, Cha Brian P. Wolford, Secretary	uir
Brian P. Wolford, Secretary	

Land Surveyor Section of the

BOARD FOR ARCHITECTS, PROFESSIONAL ENGINEERS, LAND SURVEYORS, CERTIFIED INTERIOR DESIGNERS AND LANDSCAPE ARCHITECTS MEETING MINUTES

The Land Surveyor Section of the of the Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects (APELSCIDLA Board) met on November 13, 2024, at the Department of Professional and Occupational Regulation (DPOR), 9960 Mayland Drive, Richmond, Virginia, with the following members present for all or part of the meeting:

Land Surveyors

Vickie Anglin John Claytor Kevin Shreiner

Staff present for all or part of the meeting were:

Kate Nosbisch, Executive Director Ecila Williams, Licensing Operations Administrator Jhustyna McBride-Dunn, Regulatory Operations Administrator

No one was present from the Office of the Attorney General. Brian P. Wolford, Director, Jeb Wilkinson, Chief Deputy Director, and Steve Kirschner, LRPD Deputy Director were not present at the meeting with regrets.

Members of the audience:
John Gervasi
Sean Martinez
Paige Pruett
Charlie Rice, JMT
Michael Zmuda, Virginia Association of Surveyors

Ms. Anglin called the meeting to order at 12:57 p.m.

Ms. Nosbisch and Ms. Anglin advised the Section of the emergency evacuation **Emergency**

procedures.

Evacuation Procedures

Call to Order

Mr. Claytor moved to approve the agenda with an amendment. Mr. Shreiner seconded the motion which was unanimously approved by: Anglin, Claytor and Shreiner.

Approval of Agenda

Mr. Gervasi addressed the Section with needing clarification on the usage of Public Comment

APELSCIDLA Land Surveyor Section Meeting Minutes November 13, 2024 Page 2 of 3

drones and if licensure is needed and 54.1-402 Code of Virginia is not clear nor straightforward as to if the usage of drones for mapping is an exemption from licensure as a land surveyor.

or Period

a

discussion

Mr. Martinez addressed the Section requesting additional information on how to seek licensure to be a Surveyor Photogrammetrist.

Ms. Pruett addressed Section with requests regarding improvement of surveying practices. Ms. Pruett has requested from the Board to propose mandatory reporting by surveyors of permit and/or zoning violations or issue guidance on the circumstances of when it is permissible, propose that surveyors are mandated to use different color stakes depending on the circumstances, issue document control requirements where there are multiple versions of a plot, and requiring surveyors to show distance between any structures on the property.

Ms. Anglin started the meeting addressing the regulation of drones and addressing Mr. Gervasi's inquiry regarding 54.1-402 Code of Virginia. After a long discussion with the Section and Mr. Gervasi, it was determined by the Section that the Board cannot regulate the usage of drones, but the product that is generated by those tools can be regulated, as any tools used over real property is the practice of land surveying. Ms. Anglin also further explained that exemption in 54.1-402 (c) was created to allow photogrammetry to be prepared by persons who were unlicensed specifically to use in municipal Geographic Information System (GIS) and to allow those municipal GIS departments to operate without professional land surveyors on staff.

Regulation of Drones

Ms. Anglin informed the section of NCEES offering a Fresh Perspective AI Course.

Other Business

Conflict of Interest forms and Travel Vouchers were completed by all Committee members present.

Conflict of Interest Forms / Travel Vouchers

There being no further business, the meeting was adjourned at 1:51 p.m.

Adjourn

Vickie McEntire Anglin, Chair



Education Academy Committee of the

BOARD FOR ARCHITECTS, PROFESSIONAL ENGINEERS, LAND SURVEYORS, CERTIFIED INTERIOR DESIGNERS, AND LANDSCAPE ARCHITECTS MEETING MINUTES

The Education Academy Committee of the Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects (APELSCIDLA Board) met on December 4, 2024, at the Department of Professional and Occupational Professional Engineers
James Kelly
Douglas Frost Regulation (DPOR), 9960 Mayland Drive, Richmond, Virginia.

Members present for all or part of the meeting:

Architects Tim Colley

Land Surveyors Interior Designer Vickie Anglin Arjun Kainth

Landscape Architect

Ann Stokes

Brian Wolford, Director, Jeb Wilkinson, Chief Deputy Director, and Steve Kirschner, LRPD Deputy Director were not present at the meeting with regrets.

Staff present for all or part of the meeting were:

Kate Nosbisch, Executive Director Ecila Williams, Licensing Operations Administrator Jhustyna McBride-Dunn, Regulatory Operations Administrator

Members of the audience:

Georg Dahl, P.E., Virginia Society of Professional Engineers (VSPE) STEM and Educational Outreach Lead for Tidewater/Hampton Roads Chapter

Ms. Anglin, Chair, called the meeting to order at 9:42 a.m. Call to Order

Ms. Anglin and Ms. Nosbisch advised the Committee of the emergency **Emergency** evacuation procedures. Evacuation **Procedures**

Approval of Mr. Kelly moved to approve the agenda. Ms. Stokes seconded the motion which was unanimously approved by: Anglin, Arnold, Colley, Frost, Kainth, Kelly, and Agenda

Stokes. There was no public comment. **Public Comment** Period **Open Book Exam** Ms. Nosbisch provided the APELSCIDLA open-book exam to the board members to complete as an exercise. The Committee reviewed the questions and the answers to the open-book exam. After discussion, revisions to several questions were recommended for clarity. The Committee will review the second open book exam at a later time. The Board took a recess from 10:44 a.m. to 10:51 a.m. Recess Ms. Nosbisch informed the Committee that the creation of a CE course on the **CE Overview** Boards regulations and ethics could only be required as a sanction if the individual was also being placed on probation, per counsel's advice. There was also discussion on development of CE course requirements. The Committee recommends no further action in the development of a CE course at this time. The Committee had a discussion regarding if there is a time limit for passing **Other Business** scores. The regulations do not impose an expiration on exam scores. Conflict of Interest forms and Travel Vouchers were completed by all Board **Conflict of Interest** members present. Forms / Travel **Vouchers Adjourn** There being no further business, the meeting was adjourned at 11:18 a.m. Materials contained be Vickie McEntire Anglin, Chair

APELSCIDLA Education Academy Committee Meeting Minutes

December 4, 2024

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Brian P. Wolford, Secretary

BOARD FOR ARCHITECTS, PROFESSIONAL ENGINEERS, LAND SURVEYORS, CERTIFIED INTERIOR DESIGNERS AND LANDSCAPE ARCHITECTS MEETING MINUTES

The Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects (APELSCIDLA Board) met on December 4, 2024, at the Department of Professional and Occupational Regulation (DPOR), 9960 Mayland Drive, Richmond, Virginia.

Members present for all or part of the meeting:

Professional Engineers Architects

Tim Colley James Kelly **Douglas Frost**

Land Surveyors Interior Designer

Vickie Anglin John Claytor Kevin Shreiner

Landscape Archite

Ann Stokes

Members absent from the meeting with regrets

Architects Professional Engineers

Helene Dreiling Rick Townsend Erik Bootsma

andscape Architects **Interior Designers**

Susan Dibble Catherine Stanley

Justina Vasquez

Staff present for all or part of the meeting were: Brian Wolford, Director Jeb Wilkinson, Chief Deputy Director Steve Kirschner, LRPD Deputy Director Kate Nosbisch, Executive Director Ecila Williams, Licensing Operations Administrator Jhustyna McBride-Dunn, Regulatory Operations Administrator Joe Haughwout, Regulatory Affairs Manager No one was present from the Office of the Attorney General.

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Members of the audience:

Georg Dahl, P.E., Virginia Society of Professional Engineers (VSPE) STEM and Educational Outreach Lead for Tidewater/Hampton Roads Chapter Chip Richardson, L.S., Accumark Cameron Stiles, C.I.D., Former APELSCIDLA Board Member

Ms. Anglin, Chair, finding a quorum present, called the meeting to order at 11:30 a.m.

11:30 a.m.

Ms. Anglin and Ms. Nosbisch advised the Board of the emergency evacuation procedures.

Emergency Evacuation Procedures

Ms. Stokes moved to approve the agenda. Mr. Frost seconded the motion which was unanimously approved by: Anglin, Arnold, Claytor, Colley, Frost, Kainth, Kelly, Shreiner, and Stokes.

Approval of **Agenda**

Ms. Nosbisch welcomed Arjun Kainth as the new Certified Interior Designer board member. Ms. Nosbisch introduced guests and staff of the audience.

Welcome/Introduct ions

Ms. Stiles, former Certified Interior Designer Board Member, addressed the Board on behalf of her and Ms. Alexander's concerns with the fee adjustment for the APELSCIDLA Board. Which they deemed as excessive. Ms. Stiles suggested a systematically measured approach to the fee increases to allow for regulants to remain licensed and allow for the continued growth of the number of regulants. She discussed the fee structure in North Carolina as preferable and suggested non-resident regulants pay higher fees than regulants who reside in Virginia.

Public Comment Period

Mr. Kirschner presented to the Board the proposed regulation for adoption of the final fee adjustment with amendments and provided additional details regarding the final fee adjustment requested by Board staff at the board meeting held on November 13, 2024.

Final Fee Adjustment

The Board discussed the adoption of the final fee adjustment with amendments. After a discussion, Mr. Kelly moved to approve the final fee adjustment with amendments and authorized staff to file the final fee adjustment as amended. Mr. Frost seconded the motion which was unanimously approved by: Anglin, Arnold, Claytor, Colley, Frost, Kainth, Kelly, Shreiner, and Stokes.

Conflict of Interest forms and Travel Vouchers were completed by all Board members present.

Conflict of Interest Forms / Travel **Vouchers**

Adjourn There being no further business, the meeting was adjourned at 12:28 p.m. Vickie McEntire Anglin, Chair Naterials contained be on structured and are not to be on structured and are not to be on structured and are not to be on structured. Brian P. Wolford, Secretary

Professional Engineers/ Land Surveyors Sections of the

BOARD FOR ARCHITECTS, PROFESSIONAL ENGINEERS, LAND SURVEYORS, CERTIFIED INTERIOR DESIGNERS AND LANDSCAPE ARCHITECTS MEETING MINUTES

The Professional Engineers and Land Surveyors Sections of the of the Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects (APELSCIDLA Board) met on December 4, 2024, at the Department of Professional and Occupational Regulation (DPOR), 9960 Mayland Drive, Richmond, Virginia, with the following members present for all or part of the meeting:

Professional Engineers	Land Surveyors
James Kelly	Vickie Anglin
Douglas Frost	John Claytor
-	Kevin Shreiner

Staff present for all or part of the meeting were:

Kate Nosbisch, Executive Director Ecila Williams, Licensing Operations Administrator Jhustyna McBride-Dunn, Regulatory Operations Administrator

No one was present from the Office of the Attorney General.

Brian P. Wolford, Director, Jeb Wilkinson, Chief Deputy Director, and Steve Kirschner, LRPD Deputy Director were not present at the meeting with regrets.

Members of the audience:

Georg Dahl, P.E., Virginia Society of Professional Engineers (VSPE) STEM and Educational Outreach Lead for Tidewater/Hampton Roads Chapter Chip Richardson, L.S., Accumark

Ms. Anglin called the meeting to order at 12:58 p.m. Call to Order

Ms. Nosbisch and Ms. Anglin advised the Section of the emergency evacuation procedures.

Emergency

Evacuation

Procedures

Mr. Frost moved to approve the agenda. Mr. Claytor seconded the motion which was unanimously approved by: Anglin, Claytor, Shreiner, and Frost.

Approval of Agenda

Mr. Dahl addressed the Sections to provide information about international applications being required to be licensed in a country that is signatory to the NCEES Mutual Reciprocity Agreement (MRA).

Public Comment Period APELSCIDLA Professional Engineers/Land Surveyor Section Meeting Minutes December 4, 2024 Page 2 of 2

Arrival of Board Mr. Kelly arrived for the meeting at 1:41 p.m. Member **Subsurface Utility** Ms. Nosbisch discussed with the Sections questions from NCEES regarding the Engineering practice of Subsurface Utility Engineering (SUE) in the state. After discussion, the Sections agreed on the responses to the NCEES inquiry. Ms. Nosbisch discussed with the Board the Subsurface Utility Engineering documentation provided by Mr. Richardson from Accumark. The Sections had a discussion with Mr. Richardson about SUE matters and a draft guidance document. After discussion, the Sections agreed to update the Board at its February 11, 2025 meeting. Ms. Nosbisch discussed the VAS Townhall on April 11, 2025, in Williamsburg, **Land Surveyor** VA. Mr. Claytor and Mr. Shreiner informed the Sections they will be present for **Update** the meeting. Ms. Nosbisch is tentative, and Ms. Anglin is unavailable. Ms. Nosbisch informed the Sections of the NCEES Southern Zone Meeting for **Professional** informational purposes. Ms. Nosbisch requested the board members advise her of **Engineer Update** their availability. Conflict of Interest forms and Travel Vouchers were completed by all Committee **Conflict of Interest** members present. Forms / Travel Vouchers Ler busin Adiourn There being no further business, the meeting was adjourned at 2:56 p.m. Vickie McEntire Anglin, Chair Brian P. Wolford, Secretary



To: APELSCIDLA Board

From: Kate Nosbisch, Executive Director

Subject: Executive Director Update

Date: February 11, 2025

For this initial update, data for the last five years of the Board's activities has been provided.

Application Statistics

The table below provides the number of applications approved for the APELSCIDLA Board per calendar year (January 1 – December 31) since 2019.

For 2024, 3,382 applications were received for the APELSCIDLA Board.

Applications Approved						
Year	2024*	2023	2022	2021	2020	2019
App Numbers	3,953	3,631	3,353	3,540	2,735	3,628

^{*}As of 12/31/2024 (Includes SIT and EIT Applications)

Applications Approved by Profession 2024*						
Profession	Arch	PE	LS	CID	LA	Businesses
App Numbers 568 2,145 93 33 72 428						

^{*}As of 12/31/2024

Applications Approved by				
ULR*	X			
Profession	CID			
App Numbers 9				

^{*}As of 12/31/2024

Call Center Statistics

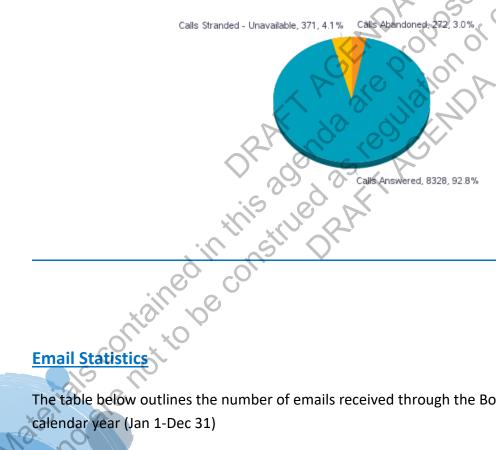
** The Call Center Statistics consists of APELSCIDLA, PSSWPG, Auctioneers, and Branch Pilots

The Board's call center has received a total of 8,719 phone calls between January 1, 2024, to December 31, 2024.

Call Center Activity

Calls Stranded - Unavailable, 371, 4.1% Calls Abandoned, 272, 3.0%





The table below outlines the number of emails received through the Board's email address per

D			Email Count			
Year	2024*	2023	2022	2021	2020	2019
# of Emails	28,364	24,429	16,318	15,317	13,528	9,339

^{*}As of 12/31/2024

Board Case Statistics

						ission
Board Case Sta	atistics				6/150	ositio.
Case Statistics						
Year	2024*	2023	2022	2021	2020	2019
# of Cases	9	3	3	9	700	5

^{*}As of 12/31/2024 (Disciplinary Actions)

Case Statistics by Profession 2019-2024					
Profession	Arch	PE	LS CID	LA	Businesses
App Numbers	5	22	2 0 0	0	2

Since 2018, The Box	ard has adjudicated 110 cases: 44 Disciplinary and 66 Licensing.
Disciplina	ary O C
Cases	45
Final Orders	14
Consent Orders	31
Revocations	9
Suspensions	1
*As of 12/31/2024	

^{*}As of 12/31/2024

Stakeholder Engagement & Outreach

CIDQ CEO Thom Banks- has asked for me to participate in the Inaugural MBE Committee

1/13-1/14/25 Attended the NCEES Member Board Administrator (MBA) Committee meeting on January 13 and the MBA meeting on January 14. Both meetings were held at NCEES headquarters in Greenville, SC.

2/5/25 2:00 NCEES State of the Council – virtual participation

2/12/25 2-4:30 ICOR Orientation – all board members invited to attend

2/16-2/22/25 Discover E Engineers Week

2/21/25 11:45-1 CIDQ Bylaws Task Force

the Council

Landscape Architecture Month

1/3/25 1:00 NCARB Region 2 Call

4/10/25 Celebrating my 25th year of service in the Commonwealth

1/11/25 3:00-5:00 Invited to again present a Town Hall at the Virurveyors annual meeting in Williamsburg, Kevin Schreimite participating.

3-4/19/25 National Architechte.

1/25 First gradure. 2/27-3/1/25 Pending approval, attending the NCARB Member Board Executive (MBE workshop on 2/27 and attending the NCARB Regional Summit with Tim Colley, Architect

4/11/25 3:00-5:00 Invited to again present a Town Hall at the Virginia Association of

4/24-4/26 Pending approval, NCEES Southern Zone Meeting in Little Rock. Attending with Jim Kelly, PE, Vickie Anglin, LS, Rick Townsend, PE, John Claytor, LS

31 World Interiors Day

In accordance with § 2.2-4002.1 of the Code of Virginia, this proposed guidance document conforms to the definition of a guidance document in § 2.2-4101.



Virginia Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers, and Landscape Architects (APELSCIDLA Board)

GUIDANCE DOCUMENT:

Property lines along public roads without recorded fee simple right of way

Adopted July 15, 2020 Effective December 1, 2020

Applicable Regulations

18VAC10-20-370.B. Minimum standards and procedures for land boundary surveying practice. Research Procedure. The professional shall search the land records for the proper description of the land to be surveyed and obtain the description of adjoining land(s) as it pertains to the common boundaries. The professional shall have the additional responsibility to utilize such other available data pertinent to the survey being performed from any other known sources. Evidence found, from all known sources, including evidence found in the field, shall be carefully compared in order to aid in the establishment of the correct boundaries of the land being surveyed. The professional shall clearly identify on the plats, maps, and reports inconsistencies found in the research of common boundaries between the land being surveyed and the adjoining land(s). It is not the intent of this regulation to require the professional to research the question of title or encumbrances on the land involved.

18VAC10-20-370.C. 4. Minimum standards and procedures for land boundary surveying practice. Minimum Field Procedures. Monumentation. As a requisite for completion of the work product, each land boundary survey of a tract or parcel of land shall be monumented with objects made of permanent material at all corners and changes of direction on the land boundary with the exceptions of meanders, such as meanders of streams, tidelands, lakes, swamps and prescriptive rights-of-way, and each such monument, other than a natural monument, shall, when physically feasible, be identified by a temporary witness marker. Where it is not physically feasible to set actual corners, appropriate reference monuments shall be set, preferably on line, and the location of each shall be shown on the plat or map of the land boundary.

Issue

Solving any boundary retracement problem requires two elements: the written intention of the parties and the physical evidence that documents or witnesses the written intention. What is the surveyor to do when the road is a prescriptive right?

This guidance document highlights the generally acceptable practices for surveys along prescriptive roads. There are many of these roads in Virginia. Prescriptive easements arise from continuous use of a particular area for a particular purpose for a requisite period with knowledge and acquiescence of the owners. These easements are thought vested in the public interest for purpose and right-of-passage over the way.

Background

Surveying after someone placed monuments 15' from the centerline of the traveled way along a prescriptive easement road can raise questions. Did they intend to sever the 15' strip? Did they record a plat of survey, and metes and bounds description where they reference those as an offset to the centerline?

Consider the Virginia Administrative Code provides that prescriptive easement roads need *not* be monumented (18VAC10-20-370.C.4).

Do we treat found, called pipe along the sidelines as offsets to the true corners? Under closer inspection of the chain of title for the property, we often find no mention of intention to dedicate fee simple right of way. The property likely passed multiple conveyances using such description which patently severs the subject property from the area of the prescriptive easement. How then is best to handle the severed strip and the property fronting the road?

Provided there is no affirmative fee simple dedication on record, accepted rules of law for reconstruction of intent, namely, that "called for" natural monument overrides an artificial monument, thus center of traveled way overrides the set pipe if the deed calls the road as the boundary. Also provided the metes and bounds description clearly indicates a property not including the road, and is whole and complete upon its face, the deed description can be interpreted primarily in two ways using existing case law as guidance.

More recent roads and streets are likely conveyed to the municipality. Dedication of platted streets conveys in fee simple to the municipality upon plat recordation after July 1, 1946 when the (state) Subdivision Code authorized the action of automatically conveying fee of rights-of-way of duly approved subdivisions to the municipality. (For further information, see Code of Virginia § 15.2-2265. Recordation of approved plat as transfer of streets, termination of easements and rights-of-way, etc.)

[&]quot;Where the description in a deed is not ambiguous, but certain and complete, there is no occasion to resort to extrinsic evidence to ascertain the intent of the parties as to the land intended to be conveyed," (Ault v. Clark, 112 N.E. 843 (1916)). Assume the strip may not have conveyed. The preferred solution is cleaning the chain of title. This may be the most advantageous solution when working toward a fee simple dedication for expanding the road. Cleaning the title of uncertainties by using eminent domain condemnation on the severed strip, via a plat styled for *Heirs and Assigns of <name of Last Known Owner>, and/or Owners Unknown* is an effective solution allowing any interested parties to come forward yet, still gaining fee simple title for the City, County, Town, or Commonwealth. This solution should be undertaken in consultation with the municipality.

The prescriptive right of way roads in VDOT Secondary Street System Maintenance are often referred to as "Byrd Act Roads." This misnomer generally refers to roads not dedicated in fee simple. Nothing within the act guides the surveyor on how to delineate the existing roads. The Byrd Act is legislation from Virginia Acts of Assembly, VA 1932, which provided relief to counties for road construction and maintenance. It created the Secondary System of Highways, and passed whatever title and interests in public roads, held by participating counties to the Commonwealth. However, in 1932, almost all roads were by common use, prescriptive. Counties generally held no title interests to the roads at that time.

Board Guidance

Surveyors often retrace property boundaries abutting public roads with no recorded fee simple right of way. These roads are often described as **prescriptive right of way** or **prescriptive easement** and are normally 30' wide. The following shall apply to the location of the property line along these roads:

Based on the recorded descriptions the surveyor shall determine when the road is the controlling monument, as in this example: "along the Ox Road, the following courses, N 27 1/2" W, 9 poles."

Generally, calls for the center of the road, along the road, or similar phrases indicate the monument is controlling. In those cases, the center of the road is the boundary.

When there is evidence of an old road scar or the current road having been in a different location, a determination of whether to use the current road or the old road location shall be made based on the preponderance of the evidence and information that can be obtained. The property line shall be established using the center of one road location or the other.

Under no circumstance shall the property line be established as 15' from the center of the road without recorded fee simple dedication for public road purposes.

Surveyors often retrace property boundaries abutting public roads with no recorded fee simple right of way where a previous survey has mistakenly established the property line as being 15' off the center of the road. The following shall apply with regard to the location of the property line along the road in such situations:

Unless there is evidence to the contrary, the assumption shall be made that the intent was not to sever or create a parcel 15' wide along the road. Further, the assumption shall be made that the "grantor is presumed to intend to convey the largest bundle of rights he or she possesses." The new survey shall go to the center of the center of the road or old property line location as described previously.

² In absence of a "clearly and expressly reserved legal title," (Smith v. Smith, 622 A.2d 642 (1993)) assume the grantor conveyed the full bundle of rights they held, not intending to hold back a strip. Inconsistencies and uncertainties are "resolved in favor of the grantee as long as such a construction does not violate any apparent intention of the parties to the transaction." Rohner v. Niemann, 380 A.2d at 552. (Id.) and "a conveyance of title to adjacent property served by an easement is presumed to pass title to the center line of the easement. 12 Am.Jur.2d Boundaries §§ 22, 38, 54 and 55 (1964). (Id.) This approach assumes the title passed with each conveyance and likely is sufficient for successive conveyances not submitting property to an act of subdivision, nor a fee simple dedication for an expansion of the road.

Surveyors should be aware of the statute, administrative code, case law, and agency guidance for solving boundaries involving public roads without recorded fee simple right of way. There are several resources in the references below with which the practicing surveyor should be familiar.

References

Ault v. Clark, 112 N.E. 843 (1916)

Code of Virginia, 2020, Title 15.2. Counties, Cities and Towns, Chapter 22. Planning, Subdivision of Land and Zoning, § 15.2-2265. Recordation of approved plat as transfer of streets, termination of easements and rights-of-way, etc. Retrieved from: https://law.lis.virginia.gov/vacode/title15.2/chapter22/

Code of Virginia, 2020, Title 33.2. Highways and Other Surface Transportation Systems Chapter 1. Definitions and General Provisions, § 33.2-105. Evidence as to existence of a public highway. Retrieved from: https://law.lis.virginia.gov/vacode/title33.2/chapter1/section33.2-105/

Smith v. Smith, 622 A.2d 642 (1993)

Spainhour v. Huffman, 237 Va. 340, 377 S.E.2d. 615; 1989 Va.

Survey Manual, Virginia Department of Transportation, 2019. Retrieved from: http://www.virginiadot.org/business/locdes/survey_manual.asp

Virginia Administrative Code, 2020, Title 18. Professional and Occupational Licensing, Agency 10. Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects, Chapter 20. 18VAC10-20-370. Minimum Standards and Procedures for Land Boundary Surveying Practice. 2018, Retrieved from: https://law.lis.virginia.gov/admincode/title18/agency10/chapter20/section370/

Ward v. Harper, 234 Va. 68, 70, 360 S.E.2d 179, 181 (1987)



Guidance Document

To: Regulants & Other Members of the Public

From: Virginia Board for Architects, Professional Engineers, Land Surveyors, Certified Interior

Designers, and Landscape Architects (APELSCIDLA Board)

Date: June 30, 2011 (Revised September 15, 2015)

Re: Requirements for the Use of Topographic Surveys, Orthographic Maps or other

Geospatial Data in Virginia

Purpose

The purpose of this document is to clarify 18VAC10-20-382.B.11 of the Board's regulations, performance standards for conducting topographic surveys, and the use of these maps and other geospatial data.

Statement Requirement for Surveys

Currently, Board regulations require that a certification statement be included with all topographic surveys:

18VAC10-20-382.B.11

A statement, in the following form, shall be shown on or contain	ned in piats, maps, or digital
geospatial data including metadata:	
This (provide description of the project) wa	is completed under the direct and
responsible charge of,	(Name of Surveyor or Surveyor
Photogrammetrist) from an actual □ Ground or □ Airborne (che	ck the one that is applicable)
survey made under my supervision; that the imagery and/or ori	ginal data was obtained on
(Date); and that this plat, map, or digital geos	patial data including metadata
meets minimum accuracy standards unless otherwise noted."	

The statement indicates that the "Name of Surveyor or Surveyor Photogrammetrist" is required. The individuals authorized to perform topographic surveys are land surveyors and surveyor photogrammetrists licensed pursuant to 54.1-400 (et seq.) of the *Code of Virginia*. However, licensed architects and professional engineers are also authorized by Virginia statute to perform topographic surveys provided the survey is incidental to the architectural or engineering project, respectively:

§ 54.1-401. Exemptions.

"The following shall be exempted from the provisions [surveyor license] of this chapter:

- 1. Practice of professional engineering and land surveying by a licensed architect when such practice is incidental to what may be properly considered an architectural undertaking.
- 2. Practice of architecture and land surveying by a licensed professional engineer when such practice is incidental to an engineering project."

It is the intent of the Board's regulations that the statement required by 18VAC10-20-382.B.11 of the Board's regulations be signed by whichever professional completed the survey- surveyor, surveyor photogrammetrist, architect, or professional engineer.

Survey Performance Standard

Board regulations also require that any licensed professional, authorized to perform a survey, must perform the survey to the standards contained in 18VAC10-20-382 of the Board's regulations:

18VAC10-20-730.C

"The professional shall adhere to the minimum standards and requirements pertaining to the practice of his own profession, as well as other professions if incidental work is performed."

When a licensed surveyor or surveyor photogrammetrist performs a topographic survey, or if an architect or professional engineer performs a topographic survey incidental to an architectural or engineering project, respectively, he must seal, sign, and date the survey per Board regulations:

18VAC10-20-382.A

"The minimum standards and procedures set forth in this section are to be used for topographic surveys performed in the Commonwealth of Virginia pursuant to Chapter 4 (§ 54.1-400 et seq.) of Title 54.1 of the Code of Virginia. The application of the professional's seal, signature and date as required by these regulations shall be evidence that the topographic survey is correct to the best of the professional's knowledge and belief, and complies with the minimum standards and procedures."

Board regulations also require a seal, signature, and date even in situations where a license is not

18VAC10-20-760.B.4

"The seal of each professional responsible for each profession shall be used and shall be on each document that was prepared under the professional's direction and for which that professional is responsible. If one of the exemptions found in § 54.1-402 of the Code of Virginia is applicable, a professional licensed or certified by this board shall nevertheless apply his seal to the exempt work."

Use of Unregulated Topographic Surveys

The Code of Virginia requires that a topographic survey be performed by a professional who is duly licensed by the Board. Topographic surveys used in the design, modification, construction of improvements to real property, or for flood plain determination must be sealed, signed, and dated by the licensed professional who performed the survey or directly supervised the person who performed the survey. A topographic survey that is not sealed, signed, and dated by a professional must only be used for general information pursuant to Virginia statute:

§ 54.1-402.C Further exemptions from license requirements for architects, professional engineers, and land surveyors.

(third paragraph) "Any person not licensed pursuant to subsection B of § 54.1-404 or 54.1-406 preparing documentation pursuant to subsection C of § 54.1-402 shall note the following on such documentation: "Any determination of topography or contours, or any depiction of physical improvements, property lines or boundaries is for general information only and shall not be used for the design, modification, or construction of improvements to real property or for flood plain determination."

Use of Unregulated Geospatial Data

In 2012, a state-wide orthographic database for general use by the public was created. Since that time, it has come to the attention of the APELSCIDLA Board that these maps may have been used, or may currently be being used, for professional design services, including, but not necessarily limited to, design of improvements to real property, flood plain determination for the determination of flood zone limits, downstream flood inundation zones below regulated dams and the design of public roads. That noted, pursuant to §54.1-402.C, all regulants are advised that these maps for your s. # do not approach the level of accuracy for use in providing design services; therefore, design professionals are cautioned that the use of this public data may be deemed a violation, as this data does not meet the minimum standards of accuracy required for use by design professionals and may be injurious to the health, safety and welfare of the public.

Summary

The excerpts from Virginia statutes and Board regulations are provided above for your convenience to help you locate the text from the administrative and positive law that establishes the Board's authority. To conclude the information above, the following summaries of this document are provided:

- Although the Board's regulations indicate that the survey statement requires the "Name of Surveyor or Surveyor Photogrammetrist, the architect or engineer who performed the survey, or directly supervised the individual who performed the survey, must place his name on the statement required by the regulations.
- 2. Surveys must be performed to the standards established in the Board's regulations whether the survey is performed by a licensed surveyor, surveyor photogrammetrist, architect, or professional engineer as indicated in this document. All surveys, regardless of whether exempt from statutory licensure requirements, must be sealed, signed, and dated by the professional who performed the survey or directly supervised the individual who performed the survey.
- 3. Any professional licensed by the Board, who utilizes a topographic survey to perform professional work, must ensure that the survey is sealed, signed, and dated properly as indicated above.
- 4. USGS quad sheets and GIS data, unregulated orthographic surveys, or other unregulated topographic surveys prepared pursuant to §54.1-402.C of the Code of Virginia, may be used Materials are not to for general information and need not be signed and sealed. The use of unsigned information must include a statement clearly depicting the use of those documents and their origin.



Regulants & Other Members of the Public

From: Virginia Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers, and Landscape Architects (APELSCIDLA Board)

Date: June 12, 2012

Re: Comity Applicant Criteria of the Board's Current Regulations (eff. July 1, 2010)

Purpose

The purpose of this document is to clarify the application requirements for those persons applying to the Board for licensure or certification via comity based on licensure or certification in a jurisdiction outside of Virginia.

Architects

Applicants for architect licensure via comity must be currently licensed as an architect (and in good standing) in another jurisdiction of the United States or a province of Canada. Applicants without a NCARB certificate must meet (as of today) the Virginia licensing requirements that they would have needed to meet when they were first licensed as an architect by another jurisdiction of the United States or a province of Canada.

For example: John Smith was first licensed as an architect in Ohio on 11/17/1985. He is presently licensed in Texas and is in good standing. He is applying for a Virginia architect license via comity. The Board regulations in effect on 11/17/1985 (the date Mr. Smith was first licensed) were last updated 10/18/1985. Therefore, Mr. Smith must demonstrate that, as of today, he meets the requirements of the Board's regulations effective 10/18/1985.

Applicants for architect licensure via comity who hold a valid NCARB certificate, are currently licensed as an architect, and in good standing are not required to demonstrate they meet any other education, examination, or experience requirements of the Board's current regulations effective 7/1/2010.

Applicants who do not meet either of the above two circumstances must satisfy the initial licensing requirements of the Board's current regulations effective 7/1/2010. These requirements are the same requirements which first-time license applicants must meet.

Professional Engineers (PE)

Applicants for PE licensure via comity must be currently licensed as a PE (and in good standing) in another jurisdiction of the United States. Applicants must successfully demonstrate that their first PE license was issued based on having met education, experience, and examination requirements which were substantially equivalent to Virginia's requirements at the same time of the applicant's original licensure. Additionally, comity applicants must submit three current references.

For example: Adam Jones was first licensed as a PE in Florida on 5/22/1994. He is presently licensed in California and is in good standing. He is applying for a Virginia PE license via comity. The Board regulations in effect on 5/22/1994 (the date Mr. Jones was first licensed) were last updated 5/19/1994. Therefore, Mr. Jones must demonstrate that when he was first licensed in Florida, he would have met the licensing requirements of the Board's regulations effective 5/19/1994. He must also submit three references.

If Mr. Jones cannot demonstrate that he met the Board's PE licensure requirements when he was first licensed in Florida on 5/22/1994, he must satisfy the initial licensing requirements of the Board's current regulations effective 7/1/2010. These requirements are the same requirements which first-time license applicants must meet.

Land Surveyors

Applicants for land surveyor licensure via comity must be currently licensed as a land surveyor (and in good standing) in another jurisdiction of the United States. Applicants must successfully demonstrate that their first land surveyor license was issued based on having met education, experience, and examination requirements which were substantially equivalent to Virginia's requirements at the same time of the applicant's original licensure. Applicants must also pass the Virginia state-specific examination.

For example: Susan Johnson was first licensed as a land surveyor in North Carolina on 4/5/2001. She is presently licensed in Maryland and is in good standing. She is applying for a Virginia land surveyor license via comity. The Board regulations in effect on 4/5/2001 (the date Ms. Johnson was first licensed) were last updated 12/1/1999. Therefore, Ms. Johnson must demonstrate that when she was first licensed in NC, she would have met the requirements of the Board's regulations effective 12/1/1999. She is also required to pass the Virginia state-specific examination regardless of any other examinations she has completed.

If Ms. Johnson cannot demonstrate that she met the Board's land surveyor licensure requirements when she was first licensed in NC, she must satisfy the initial licensing requirements of the Board's current regulations effective 7/1/2010. These requirements are the same requirements which first-time license applicants must meet.

Landscape Architects

Applicants for landscape architect licensure via comity must be currently licensed as a landscape architect (and in good standing) in another jurisdiction of the United States. Applicants must successfully demonstrate that their first landscape architect license was issued based on having met education, experience, and examination requirements which were not in conflict with, and at least as rigorous as, Virginia's statutory and regulatory requirements at the same time of the applicant's original licensure.

For example: Brad Moore was first licensed as a landscape architect in New Jersey on 8/14/2004. He is presently licensed in Massachusetts and is in good standing. He is applying for a Virginia landscape architect license via comity. The Board regulations in effect on 8/14/2004 (the date Mr. Moore was first licensed) were last updated 3/1/2002. Therefore, Mr. Moore must demonstrate that when he was first licensed in NJ, he would have met the requirements of the Board's regulations effective 3/1/2002.

Applicants for landscape architect licensure via comity who hold a valid CLARB certificate, are currently licensed as a landscape architect, and in good standing are not required to demonstrate they meet any other education, examination, or experience requirements of the Board's regulations.

If Mr. Moore cannot demonstrate that he met the Board's landscape architect licensure requirements on 8/14/2004, he must satisfy the initial licensing requirements of the Board's current regulations effective 7/1/2010. These requirements are the same requirements which first-time license applicants must meet.

Interior Designers

Applicants for interior designer certification via comity must be currently licensed or certified as an interior designer (and in good standing) in another jurisdiction of the United States. Applicants must successfully demonstrate that their first interior designer license or certification was issued based on having met education, experience, and examination requirements which were equal to the Board's requirements at the same time of the applicant's original licensure or certification.

For example: Jane Smith was first licensed as an interior designer in New York on 12/4/2005. She is presently certified in Georgia and is in good standing. She is applying for Virginia interior designer certification via comity. The Board regulations in effect on 12/4/2005 (the date Ms. Smith was first licensed or certified) were last updated 12/1/2004. Therefore, Ms. Smith must demonstrate that when she was first licensed in New York, she would have met the requirements of the Board's regulations effective 12/1/2004.

If Ms. Smith cannot demonstrate that she met Virginia's interior designer certification requirements on 12/4/2005, she must satisfy the initial certification requirements of the Board's current regulations effective 7/1/2010. These requirements are the same requirements which first-time certification applicants must meet.

Summary

Applicants for architect licensure via comity must either have a NCARB certificate or demonstrate that they meet (as of today) the Board requirements which were in effect when their first architect license was issued.

Applicants for PE, land surveyor, and landscape architect (without a CLARB certificate) licensure via comity must demonstrate that they would have met the Board's requirements had they applied in Virginia at the same point in time during which they were first licensed by a state other than Virginia. This means that all supporting documentation must clearly show that the experience, examination, and education requirements were satisfied at the time their first license was issued.

Applicants for interior designer certification by comity must demonstrate that they would have met the Board's requirements had they applied in Virginia at the same point in time during which they were first certified or licensed by a state other than Virginia. This means that all supporting documentation must clearly show that the experience, examination, and education requirements were satisfied at the time their first license or certification was issued.

Land Surveyor's Apprenticeship: Classroom Related Technical Instruction via Retrieve Platform

Introduction

This proposal outlines a comprehensive plan to deliver the Survey 1-5 curriculum, consisting of five modules, each comprising 64 sessions, using the Retrieve platform. This will satisfy the core component of the Land Surveying Apprenticeship standards, providing 600 hours of Related Technical Instruction. An additional 120 Hours of Elective Content may be made available to satisfy to the total of 720 hours required.

Objectives

- To provide a structured and interactive learning experience.
- To ensure students gain a thorough understanding of surveying principles and practices.
- To prepare students for professional certification and practical application in the field.

Program Administration

The program will be administered by a mixed board of directors, including licensed surveyors, educators, and engineers. This diverse board ensures a well-rounded and expert-driven approach to the curriculum, providing students with comprehensive and practical knowledge in surveying.

Elective Technical Instruction

In addition to the core curriculum of 600 hours, apprentices will be required to obtain an additional 120 hours of related technical instruction. These hours are made up of electives, chosen by the apprentice and their employer. This allows for customization of the learning experience to better suit the specific needs and interests of the apprentice, ensuring a more tailored and relevant educational journey.

Implementation Plan

- 1. Platform Setup
- Configure Retrieve to host the course content, including videos, documents, quizzes, and interactive modules.
- Ensure all students have access to the platform and are familiar with its features.

2. Content Delivery

- Content Authors will coordinate with Retrieve, to format and upload relevant content sessions in accordance with the breakdown below.

- Retrieve AI will coordinate regular knowledge check assessments throughout the session, as well as brief quizzes periodically.
 Module Final Exams will be provided (potential)
- Program Administration, and graded accordingly.
- -Projects shall be assessed at the end of each Module by Program Administration, and graded accordingly.

Grading Policy

Overall Module Grading Breakdown:

- Session Completion: 50%
- Project Assessment: 20%
- Module Final Exam: 30% (Must achieve score of >60% on exam regardless of other grades)

Session Breakdown

Each session will be 1.5 hours long, totaling 96 hours of instruction per Module. The sessions are designed to be interactive, incorporating multimedia resources, practical exercises, and assessments to enhance learning outcomes.

Employer/Sponsor Session

Session created to introduce both apprentices and their sponsor to apprenticeship requirements, objectives, obligations, etc. Provides instruction on application and compliance with apprenticeship requirements.

ession Breakdown for Module One (64 Sessions)

Introduction to the Course (1 Session)

Session 1: Course Overview, Objectives, and Introduction to Surveying

APELSCIDLA Rules and Regulations (Can be supplemented with state specific content) (1 Session)

Red topics for discussifion and position Session 2: Overview of APELSCIDLA, Licensing Requirements, and Professional Ethics, Regulatory Compliance

Survey Mathematics (7 Sessions)

- Session 3: Basic Math Review
- Session 4: Algebra in Surveying
- Session 5: Trigonometry in Surveying
- Session 6: Geometry in Surveying
- Session 7: Calculus in Surveying
- Session 8-9: Practical Applications

Errors in Measurement (4 Sessions)

- Session 10: Types of Errors
- Session 11: Sources of Errors
- Session 12: Error Analysis
- Session 13: Minimizing Errors

Distance Measurement (includes Taping/Corrections) (6 Sessions)

- Session 14: Methods of Distance Measurement
- Session 15: Taping Techniques
- Session 16: Corrections in Taping
- Session 17: Electronic Distance Measurement (EDM)
- Session 18: GPS Distance Measurement
- Session 19: Practical Exercises

Angular Measurement (6 Sessions)

- Session 20: Principles of Angular Measurement
- Session 21: Instruments for Angular Measurement
- Session 22: Theodolites and Total Stations
- Session 23: Angle Measurement Techniques
- Session 24: Error Sources in Angular Measurement
- Session 25: Practical Exercises

• Session 25: Practical Exercises • Differential Leveling (6 Sessions) • Session 26: Principle

- Session 26: Principles of Leveling
- Session 27: Instruments for Leveling
- Session 28: Leveling Techniques
- Session 29: Error Sources in Leveling
- Session 30: Applications of Leveling
- Session 31: Practical Exercises

Traverse Computations (6 Sessions)

- Session 32: Basics of Traverse Computations
- Session 33: Adjusting Traverses
- Session 34: Coordinate Computations
- Session 35: Error Analysis in Traverses
- Session 36: Practical Applications
- Session 37: Case Studies

Horizontal Curves (4 Sessions)

- Session 38: Types of Horizontal Curves
- Session 39: Curve Design Principles
- Session 40: Computation of Curve Elements
- Session 41: Practical Applications

Vertical Curves (4 Sessions)

- Session 42: Types of Vertical Curves
- Session 43: Curve Design Principles
- Session 44: Computation of Curve Elements
- Session 45: Practical Applications

Topographic / Photogrammetric Surveys (6 Sessions

- Session 46: Principles of Topographic Surveys
- Session 47: Instruments and Techniques
- Session 48: Photogrammetry Basics
- Session 49: Applications of Photogrammetry
- Session 50: Data Processing
- Session 51: Practical Exercises

Geodesy / GPS / GIS (6 Sessions)

- Session 52: Introduction to Geodesy
- Session 53: GPS Fundamentals
- Session 54: GIS Basics
- Session 55: Applications of GPS and GIS
- Session 56: Data Integration

Session 57: Practical Exercises Emerging Surveying Technologies (4 Sessions)

- Session 58: Overview of Emerging Technologies
- Session 59: UAVs in Surveying
- Session 60: 3D Laser Scanning
- Session 61: Future Trends

sed topics to aid position

Fundamentals of Surveying Exam Review (3 Sessions)

Session 62-64 Review of Key Concepts and Practice Problems

Dessions) + 30 Hour Project Dession 1: Overview of Licensing Requirements and Trade Practices Theory of Errors in Observations and Coordinate Geometry (COGO) (10 sessions) Session 2: Introduction to Theory of Errors Session 3: Types of Errors in Observations Session 4: Error Analysis Tech Session 5: Inter

- Session 6: COGO Applications in Surveying
- Session 7: Analysis of Survey Measurements
- Session 8: Adjustments of Survey Measurements
- Session 9: Practical Exercises in Error Analysis
- Session 10: Practical Exercises in COGO
- Session 11: Exam on Theory of Errors and COGO

Horizontal Curves (8 sessions)

- Session 12: Introduction to Horizontal Curves
- Session 13: Formula Derivations for Horizontal Curves
- Session 14: Note Keeping for Layout
- Session 15: Compound Curves
- Session 16: Reverse Curves
- Session 17: Practical Exercises in Curve Layout
- Session 18: Case Studies in Horizontal Curves

Control Surveys and Geodetic Reductions (10 sessions) Session 20: Introduction to Control Surveys Session 21: Horizont

- Session 22: Vertical Control Networks
- Session 23: Geodetic Reductions
- Session 24: National Geodetic Reference System (NGRS)
- Session 25: Practical Exercises in Control Surveys
- Session 26: Practical Exercises in Geodetic Reductions

- Session 27: Case Studies in Control Surveys
- Session 28: Case Studies in Geodetic Reductions
- Session 29: Exam on Control Surveys and Geodetic Reductions

Map Projections and State Plane Coordinates (8 sessions)

- Session 30: Introduction to Map Projections
- Session 31: Lambert Conformal Projection
- Session 32: Transverse Mercator Projection
- Session 33: State Plane Coordinate System
- Session 34: Practical Exercises in Map Projections
- Session 35: Practical Exercises in State Plane Coordinates
- Session 36: Case Studies in Map Projections
- cs for discussion Session 37: Exam on Map Projections and State Plane Coordinates

Astronomic Azimuth Determination (8 sessions)

- Session 38: Introduction to Applied Astronomy
- Session 39: Celestial Coordinate Systems
- Session 40: Techniques for Determining Astronomic Azimuth
- Session 41: Practical Exercises in Astronomic Azimuth Determination
- Session 42: Case Studies in Applied Astronomy
- Session 43: Practical Applications in Surveying
- Session 44: Review of Key Concepts
- Session 45: Exam on Astronomic Azimuth Determination

Photogrammetry (5 Sessions)

- Session 46: Introduction to Photogrammetry
- Session 47: Emerging Technology in Photogrammetry
- Session 48: Achievable Accuracies and Error in Photogrammetry
- Session 49: Processing Photogrammetric Data
- Session 50: Photogrammetry Review and Exam

Global Positioning System (GPS) (10 sessions)

- Session 51: Introduction to GPS
- Session 52: Field Procedures for GPS
- Session 53: Observing Methods in GPS
- Session 54: Achievable Accuracies in GPS
- Session 55: Practical Exercises in GPS Field Procedures
- Session 56: Practical Exercises in Observing Methods
- Session 57: Case Studies in GPS Applications
- Session 58: Advanced GPS Techniques

- Session 59: Review of Key Concepts
- Session 60: Exam on GPS

Additional Topics or Review Sessions (4 sessions)

- sed topics to discussifion Session 61: Advanced Topics in Surveying (as needed)
- Session 62: Practical Applications and Case Studies
- Session 63: Final Exam Review
- Session 64: Final Exam

Photogrammetric Project (30 hours)

- Project Planning and Design (5 hours)
- Data Collection Techniques (5 hours)
- Data Processing and Analysis (10 hours)
- Practical Exercises in Photogrammetry (5 hours)
- Project Presentation and Review (5 hours)

Session Breakdown for Module 3 (64 S essions + 30hr Project)

Leveling and Profiles (8 Sessions)

- Session 1: Introduction to Leveling
- Session 2: Equipment and Methods
- Session 3: Profiles and Cross-Sections
- Session 4: Practical Applications
- Session 5: Field Exercises
- Session 6: Data Analysis
- Session 7: Common Errors and Corrections
- Session 8: Review and Practice

Vertical Curves (8 Sessions)

- Session 9: Introduction to Vertical Curves
- Session 10: Types of Vertical Curves
- Session 11: Design Principles
- Session 12: Calculation Methods
- **Session 13: Practical Applications**
- Session 14: Field Exercises
- Session 15: Data Analysis
- Session 16: Review and Practice

Cross-Sections Leveling and Typical Sections (8 Sessions)

- Session 17: Introduction to Cross-Sections
- Session 18: Equipment and Methods
- Session 19: Typical Sections

Earthwork Volumes, Linear Projects, Grading Plans, Borrow Pit and Contour Method (8 Sessions) • Session 25: Introduction to Earthwork Volumes • Session 26: Calculation Methods • Session 27: Linear Projects • Session 26: Calculation Methods

- Session 28: Grading Plans
- Session 29: Borrow Pit Method
- Session 30: Contour Method
- Session 31: Practical Applications
- Session 32: Review and Practice

Unit Exam/History of Surveying (1 Session

Session 33: Unit Exam and History of Surveying

Public Lands Survey System (2 Sessions)

- Session 34: Introduction to Public Lands Survey System
- Session 35: Historical Background

Maps & Photographs (2 Sessions)

- Session 36: Introduction to Maps
- Session 37: Types of Maps

bdivision Design (2 Sessions)

- Session 38: Research and Schemes
- Session 39: Preliminary Layout

Street Design (2 Sessions)

- Session 40: Street Design Principles
- Session 41: Practical Applications

Lot Computations and Curves (2 Sessions)

Session 42: Lot Computations

Session 43: Curve Calculations

Plans and Profiles (2 Sessions)

- Session 44: Creating Plans
- Session 45: Developing Profiles

Street Grading Plan (2 Sessions)

- Session 46: Introduction to Street Grading
- Session 47: Practical Applications

Virginia Sediment and Erosion Control; Stormwater Best Management Practices (2 Sessions)

- Session 48: Introduction to Sediment and Erosion Control
- Session 49: Stormwater Best Management Practices

Lot Grading (2 Sessions)

- Session 50: Lot Grading Principles
- Session 51: Practical Applications

Siting the Dwelling (2 Sessions)

- Session 52: Siting Principles
- Session 53: Practical Applications

Sketching the Lot Grading Plan (2 Sessions)

- Session 54: Introduction to Sketching
- Session 55: Practical Exercises

Plotting Drainage Divides (2 Sessions)

- Session 56: Introduction to Drainage Divides
- Session 57: Practical Applications

S.U.E., Sub-Surface Utilities Engineering, Laws and the Segment of Land Surveying Related to SUE (2 Sessions)

- Session 58: Introduction to S.U.E.
- Session 59: Legal Framework and Practical Applications

Ethics & Minimum Standards (2 Sessions)

- Session 60: Introduction to Ethics
- Session 61: Minimum Standards in Surveying

Construction Layout, Business, Economics, Finance (2 Sessions)

- Session 62: Introduction to Construction Layout
- Session 63: Overview of Business, Economics, and Finance in Surveying

Final Exam (1 Sessions)

Session 64: Comprehensive Final Exam

CADD Based Preparation of Site and Subdivision Type Documents, Plats, Plans, etc. (30 hours) Project Planning and Design (5 hours) - Detailed planning and design of the project. Data Collection Techniques (5 hours) - Fieldwork and data integration using CADD. Data Processing and Analysis (10 hours)

- Processing the collected data and performing necessary analyses

Practical Exercises in CADD (5 hours)

- Hands-on exercises to apply CADD techniques.

Project Presentation and Review (5 hours)

- Presentation of the project findings and review by peers and instructors.

Session Breakdown for Module 4 (64 Sessions + 30hr Project)

Introduction to Hydrology (8 Sessions)

- Session 1: Introduction to Hydrology
- Session 2: Stormwater Runoff
- Session 3: Urban Water Cycle
- Session 4: Soils/Land Cover & Topographical Changes
- Session 5: Stream Impacts
- Session 6: Water Quality Impacts
- Session 7: Practical Applications
- Session 8: Review and Practice

Hydrology Formulas (4 Sessions)

- Session 9: The Rational Formula
- Session 10: The Anderson Formula
- Session 11: NRCS Technical Release 55 (TR-55)
- Session 12: Practical Applications and Case Studies

Introduction to Hydraulics (8 Sessions)

- Session 13: Introduction to Hydraulics
- Session 14: Fluid Properties
- Session 15: Fluid Statics
- Session 16: Fluid Dynamics
- Session 17: Open Channel Flow
- Session 18: Practical Applications
- Session 19: Field Exercises
- Session 20: Review and Practice

Hydraulic Equations and Sewer Design (8 Sessions)

- Session 21: Manning's Equation
- Session 22: Storm Sewer Hydraulics
- Session 23: Sanitary Sewer Design
- Session 24: Practical Applications and Case Studies
- Session 25: Inlet Design Principles
- Session 26: On Grade Conditions
- Session 27: Sump Conditions
- Session 28: Practical Applications and Case Studies

Systems Head Losses and Culvert Hydraulics (8 Sessions)

- Session 29: Systems Head Losses
- Session 30: VDOT Standard Step
- Session 31: Culvert Hydraulics
- Session 32: Inlet/Outlet "Barrel" Control
- Session 33: Practical Applications
- Session 34: Field Exercises
- Session 35: Data Analysis
- Session 36: Review and Practice

Virginia Runoff Reduction Method (4 Sessions)

- Session 37: Introduction to Virginia Runoff Reduction Method
- Session 38: Stormwater Management
- Session 39: Water Quantity Requirements
- Session 40: Water Quality Requirements

Best Management Practices (BMP) (4 Sessions)

- Session 41: Introduction to BMP
- Session 42: Structural BMP
- Session 43: Non-Structural BMP
- Session 44: Practical Applications and Case Studies

State and Local Regulations (4 Sessions)

Session 45: State (DEQ) Regulations

sed topics for discussifion sition of the chical position of the chi

- Session 46: MS4/Virginia Stormwater Management Program (VSMP)
- Session 47: VPDES General Permit
- Session 48: Chesapeake Bay TMDL

Sediment and Erosion Control (4 Sessions)

- Session 49: Sediment and Erosion Control Principles
- Session 50: Certifications
- Session 51: Local Ordinances
- Session 52: Fairfax County Stormwater Regulations

Chesapeake Bay (4 Sessions)

- Session 53: Chesapeake Bay Overview
- Session 54: Environmental Impacts
- Session 55: Conservation Efforts
- Session 56: Practical Applications and Case Studies

discussion di discussion discussion discussion discussion discussion discussi Advanced Topics and Practical Applications (4 Session

- Session 57: Advanced Topics in Hydrology
- Session 58: Advanced Topics in Hydraulics
- Session 59: Case Studies in Stormwater Management
- Session 60: Practical Exercises in BMP

Additional Topics (2 Sessions)

- Session 61: Advanced Techniques in Water Quality Management
- Session 62: Innovative Stormwater Solutions

Review and Final Exam (2 Sessions

- Session 63: Final Review Session
- Session 64: Comprehensive Final Exam

Stormwater, BMP, Water Quality Design – Using Structural and Non-Structural Methods (30 hours)

Project Planning and Design (5 hours)

- Detailed planning and design of the project.

Data Collection Techniques (5 hours)

Fieldwork and data collection.

Data Processing and Analysis (10 hours)

- Processing the collected data and performing necessary analyses.

Practical Exercises (5 hours)

- Hands-on exercises to apply design techniques.

Project Presentation and Review (5 hours)

Presentation of the project findings and review by peers and instructors.

Sessions Breakdown for Module 5 (64 Sessions + 30hr Project)

Introduction and Fundamentals (10 Sessions)

- Session 1: Course Introduction/Syllabus
- Session 2: Virginia Statutory Law related to the practice of Land Surveying
- Session 3: APELSCIDLA (Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers, and Landscape Architects)
- Session 4: Types of Surveys
- Session 5: Dillon Rule in VA
- Session 6: Subdivision and Zoning Ordinances
- Session 7: Byrd Act
- Session 8: Statute of Frauds
- Session 9: Estoppel
- Session 10: Rights of Way, Discontinuance, Vacation, and Abandonment

Deeds and Legal Descriptions (10 Sessions)

- Session 11: Types of Deeds
- Session 12: Levels of Warranty
- Session 13: Quiet Title Action
- Session 14: Quitclaim Deeds
- Session 15: Legal Descriptions
- Session 16: Reconstruction of Intent
- Session 17: Order of Construction
- Session 18: Weight of Evidence
- Session 19: Conveyances: Sequential and Simultaneous
- Session 20: Reconstruction of Intent Applications in Boundary Solutions: Sequential/Simultaneous

Practical Applications and Research (10 Sessions)

- Session 21: Deed Research/CPAN
- Session 22: Project Outline-Kickoff
- Session 23: Quarter Exam
- Session 24: Introduction to Case Law Research
- Session 25: Unwritten Rights: Boundary by Adverse Possession
- Session 26: Boundary by Agreement
- Session 27: Boundary by Acquiescence and Acceptance
- Session 28: Littoral/Riparian Boundary & Rights
- Session 29: Case Study: Littoral/Riparian Boundary & Rights

Session 30: Easements

Specialized Surveys and Plans (10 Sessions)

- Session 31: ALTA/NSPS Land Title Survey
- Session 32: Railway Plans
- Session 33: Utility Plans
- Session 34: VDOT Plans and Alignments
- Session 35: Project Management
- Session 36: Virginia Condominium Act
- Session 37: NEED TOPIC
- Session 38: NEED TOPIC
- Session 39: Due Diligence/Records Management
- Session 40: The Weight of Tax Assessment Maps

Advanced Topics and Ethics (10 Sessions)

- Session 41: Informal Consolidations NOT
- Session 42: Use of GIS in Land Surveying
- Session 43: Ethics for the Surveyor
- Session 44: Advanced Case Law Research
- Ton-Session 45: Practical Applications in Boundary Solutions
- Session 46: Advanced Project Management Techniques
- Session 47: Environmental Considerations in Land Surveying
- Session 48: Technology Trends in Land Surveying
- Session 49: Professional Development and Continuing Education
- Session 50: Client Relations and Communication

Additional Topics (12 Sessions)

- Session 51: NEED TOPIC
- Session 52: NEED TOPIC
- Session 53: NEED TOPIC
- Session 54: NEED TOPIC
- Session 55: NEED TOPIC
- Session 56: NEED TOPIC
- Session 57: NEED TOPIC
- Session 58: NEED TOPIC
- Session 59: NEED TOPIC
- Session 60: NEED TOPIC
- Session 61: Review of FLS (Fundamentals of Land Surveying) Content Areas
- Session 62: Review of PLS (Principles and Practice of Land Surveying) Content Areas

Final Preparations and Exams (2 Sessions)

- Session 63: Review Session
- Session 64: Final Exam

Project Breakdown: Land Records Research (30 Hours)

Osed topics for discussifion **Phase 1: Project Planning and Preparation (5 Hours)**

Project Kickoff Meeting (1 Hour)

Research Plan Development (2 Hours)

Gathering Initial Resources (2 Hours)

Phase 2: Data Collection and Analysis (15 Hours)

Land Records Collection (5 Hours)

Document Review and Analysis (5 Hours)

Field Verification (if applicable) (5 Hours)

Phase 3: Synthesis and Reporting (8 Hours

Data Synthesis (3 Hours)

Drafting the Report (3 Hours)

Review and Revision (2 Hours)

Phase 4: Presentation and Wrap-Up 2 Hou

Presentation Preparation (1 Hour)

Final Presentation and Feedback (1 Hour)

Assessment and Feedback

- Regular quizzes, interactive exercises, and assignments to assess understanding and provide feedback.
- Final mock exam to prepare students for the Fundamentals of Surveying exam.

Support and Resources

- Provide additional resources such as reading materials, reference guides, and access to expert support through Retrieve/VAS Online.
- Board approved reference material including:
- Basic Text: "Land Surveyor Reference Manual", second edition, Andrew L. Harbin ISBN: 0-912045-09-4, Professional Publications, Inc.
- References: "Solutions Manual for the Land Surveyor Manual", second edition, Andrew L. Harbin ISBN: 0-912045-42-6, Professional Publications, Inc.

- "Surveying", ninth edition, Moffet & Bouchard ISBN: 0-06-500059-5, Harper Collins Publishers, Inc.
- "Elementary Surveying", current edition, Paul R. Wolf and Russell Brinker ISBN: 0-06-500399-3, Harper Collins Publishers, Inc.
- "Basic Occupational Mathematics", David Newton ISBN: 0-8251-1676-7, J. Weston Walch Publisher
- "Brown's Boundary Control and Legal Principles", 6th Edition, Robillard, Wilson, and Brown ISBN: 978-0-470-18354-0, Wiley Publishing
- -"Evidence and Procedures for Boundary Location", 3rd Edition, Brown, Robillard, Wilson ISBN: 0471552194, Wiley Publishing All Other Texts as the Instructors Deem Necessary

Conclusion

This proposal aims to deliver a comprehensive and engaging learning experience using Retrieve, ensuring students are well-prepared for their professional careers in surveying. By leveraging the platform's capabilities, we can provide a structured, interactive, and effective educational program that will provide the classroom component required by the Voluntary Apprenticeship Act (Code 40.1-117 – 40.1-126).

*** Additional Modules to be included if need be. Additional modules may be created to fit state specific needs in lieu of VA based curriculum***





Suite 100 Virginia Beach, VA 23452 T: 757-497-7472 F: 757-497-0250

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January 29, 2025

Department of Professional and Occupational Regulation 9960 Mayland Drive Suite 400 Richmond VA 23233-1485

Dear Board Members,

dent of the program I am writing this letter as a licensed Virgina Surveyor and a past President of the Virginia Association of Surveyors (VAS) in support of the VAS effort to start instructional programs for the land surveyor apprenticeship via the Retrieve platform. The surveyors in Virgina need this program so they can work towards licensure at their own pace.

There is no current four-year college curriculum in the State of Virginia. This program will allow surveyors the opportunity to educate themselves while working so they can achieve the goal of licensure. This proposed program will help fill the surveying education void in Virgina.

I strongly encourage the Board to approve this much needed program.

Very Respectfully,

Bruce J. Frederick, LS, Regional Vice President Materials Jaken PENNONI ASSOCIATES INC.

January 30, 2025

Dear Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects,

I am writing to offer my strong support for the new Land Surveyor's Apprenticeship: Classroom Related Technical Instruction via Retrieve. This initiative represents an essential step forward in addressing the growing demand for qualified professionals in the surveying field and enhancing the current set of options for entering the field.

As the surveying profession continues to lose trained professionals to an aging workforce, it is crucial that we provide relevant and accessible training to meet the challenges of the industry. This course offers flexibility to candidates, enabling them to complete their training at their pace while balancing work and personal commitments. In a field with an aging workforce and a need for continuing education, the ability to engage in self-directed learning can significantly improve the industry's breadth of candidates. This apprenticeship creates opportunities for individuals from small towns or more rural areas to access a top-tier learning experience that will train them for a stable career. The demand for surveying industries continues to rise, driven by infrastructure projects and land development across the state. It is critical that we recruit and train personnel from all areas of the state and this program is a unique opportunity to provide a professional education to those interested in joining the infrastructure workforce.

The emphasis on modern and efficient training methods is a key strength of this apprenticeship. Candidates will complete the Related Technical Instruction through a rigorous curriculum directly aligned to the Land Surveying Apprenticeship standards. Candidates will receive individualized feedback and engage in assessments and projects that track mastery. Uniquely, candidates will collaborate with their employer to choose electives that match their goals. The asynchronous Retrieve platform will open doors that currently do not exist for the surveying industry. This program may be the only option many individuals have to pursue their goals of joining the industry and it is incumbent on us to create these opportunities.

I look forward to seeing the positive impact of this certification program in the Commonwealth.

∂oanna Hansen, M.Ed.

Instructional Coach & Special Educator

571-267-0770

NASH SURVEYING SERVICES, PLLC

3815 Briery Rd. Keysville, VA. 23947

31 January 2025

RE: Land Surveyor's Apprenticeship Proposal

Virginia Department of Professional and Occupational Regulation Board for Architects, Professional Engineers, Land Surveyors, Certified Interior Designers and Landscape Architects. 9960 Maryland Dr., Suite 400 Richmond, VA 23233

Honorable Board members,

On 11 February you will consider a proposal for an apprenticeship program for land surveyors made by Sean Peiffer, LS. Virginia land surveyors are in need of good education programs now more than ever. Our profession is small in numbers compared to others and as a result we have lost educational offerings within our state boundaries. Today's prospective technicians and professionals are looking for alternatives to traveling long distances to attend classes and this proposal could help many with on-line offerings.

Sean has been involved in educating surveyors for a number of years and understands what the loss of education offerings has meant to Virginia land surveyors. Please consider carefully what he has put together. I feel it is of the upmost importance to the health, safety and welfare of the citizens of Virginia to ensure anyone looking to work in the geomatics field or become a licensed professional has access to quality education.

Thank you in advance for your consideration,

Will Nash

W.E. Nash, LS wenashls@kinex.net 434.390.6215

VIRGINIA DEPARTMENT OF PROFESSIONAL & OCCUPATIONAL REGULATION PERIMETER CENTER, SUITE 400 9960 MAYLAND DRIVE RICHMOND, VIRGINIA 23233 Phone: 804-367-8500 Facsimile: 804-367-2475 Complaints: 804-367-8504 E-Mail: dpor@dpor.virginia.gov Web: http://www.dpor.virginia.gov						ioo!		Ostra	CUS,	ion		
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Architects	7,695 7,73			7,756		7,775	7,781	7,782	7,795	7,786	7,738	7,813
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