

Group Level	Skill Number	Skill	Complement Per Office	Prerequisites	Duties	Rank	Training	Measurements
All Core	4LS1	Project Development, Analysis & Compilation	3	FEP - Highway Design (or HEC), 3LS1, 3LS2, 3LS4, 3LS5, 3LS8, 3LS9	Collect, compile appropriate field survey data on TIP projects, including review of field/office data compiled by others)	3	Min. 1 year OJT using Mentor with standardized guidelines. Advanced Route Location Course . FEP Highway Design Module	Technician will compile a portfolio of 5 diversified full survey projects (i.e. Bridge, Rural, Interstate &/or Urban). in which he/she satisfactorily completed all phases of project development to be initialed and approved by supervisor utilizing standardized evaluation form. Successful completion of Advanced Route Location/Geodesy Course. At completion of 1 year of OJT, conduct a final evaluation interview to discuss completed projects. Interview will include a standardized evaluation review form of project development questions and scenarios to be determined by upper management. Successful completion of NCDOT FEP Highway Design Module or bypass exams.
All Core	4LS2	Public Involvement & Communication	3		Include representing NCDOT and Unit in informal meetings with other Units/Divisions, property owners and interested public	3	Min. 9 months OJT using Mentor with standardized guidelines. Attend Dealing with the Public (ADM 675). Attend the Highway Design Branch Tour. Attend a minimum of 1 Public Hearing, 1 Informational Workshop. Familiarization with Planning document types. Basic Engineering I & II (SSC 070 &071)	Exemplify good judgement in communicating with the public and other units in NCDOT. Expectation Form should include courtesy, professionalism, understanding of project scope as it relates to the property owner and general public, etc. as identified by supervisor. Successful completion of Dealing with the Public & Media Courses. Conduct an evaluation interview to assess knowledge of planning document. Interview will include a standardized evaluation review form of questions to be determined by upper management. Successful completion of Basic Engineering I & II.
Field Core	4LS3	Level 3 Supervision/Lead Worker - Primary Survey Team Leader	3	3LS4, 3LS7, 3LS8	Primary Survey Team Leader in charge of field operations on large route location project	3	Require Level 2 Supervision/Lead Worker as a Prerequisite. Min. 1 year OJT using Mentor . Concepts of Leadership (MGT 112), Interaction Management (MGT 150)	Exemplify good judgement in leading a survey crew in completion of 3 diversified survey projects (i.e. Bridge, Rural, Interstate &/or Urban). Projects should include all phases of project development in order to complete a full survey. Expectation Form should include timeliness, quality, quantity, organizational development, assertiveness, leadership, delegation, etc. as identified by supervisor. Satisfactory completion of recommended course list by upper management.

Field Core	4LS4	Level 3 Work Zone Safety	3	3LS8	Traffic Control/ Sign Placement, high volume travelways	3	Intermediate Work Zone Safety (SAF 505). Other Lead Worker Safety courses to be determined and recommended by upper management. Min. 1 year OJT using Mentor with standardized guidelines	Successful completion of various recommended Safety courses. At completion of 1 year of OJT, conduct a final evaluation interview to discuss safety successes, near misses, and incidences during the past year's progression. Interview will include a standardized checklist of safety questions and scenarios including SOP's to be determined by upper management. Successful completion will be determined by supervisor's observation and assessment interview team. Assessment interview team will review safety audits performed on various projects and safety record.
Field Core	4LS5	Level 2 GPS Survey Operation (RTK/Static)	3	2LS6, 3LS8, 2LS12	Planning and Supervision of GPS surveys	3	Basic GPS Office Procedures. Min.6 months to include at least one panel season of OJT using Mentor with standardized guidelines.	Successful completion of "Basic GPS Office Procedure" class. Technician will compile a portfolio of minimum of 5 projects (to include at least 3 paneling projects with a minimum of 50 points total) of satisfactory completion of instrument operation, data collection, and processing.
PDC Core	4LS6	Supervision/Lead Worker -	3	3LS3, 3LS4, 3LS6, 4LS1	Team Leader in charge of developing PSD/Condemnation files for multi-person CADD squad	3	Require Level 2 Supervision/Lead Worker as a Prerequisite. Min. 1 year OJT using Mentor . Concepts of Leadership (MGT 112) and other various management classes to be reviewed and recommended by upper management	Exemplify good judgement in leading a CADD squad in PSD/Condemnation development for minimum 6 months. Expectation Form should include timeliness, quality, quantity, organizational development, assertiveness, leadership, delegation, etc. as identified by supervisor. Satisfactory completion of recommended course list by upper management. PDC: Exemplify good judgment in reviewing & directing squad of technicians
PDC Core	4LS7	Project Quality Review/Data Transmittal	3	3LS2, 3LS3, 3LS4, 4LS1	(TIP project review to include completeness and compliance with unit-wide guidelines; data transmittal to multiple Units; problem resolution)	3	Min. 1 year OJT using Mentor with standardized guidelines. Require Advanced Route Location Course as identified in "Training Proposal for Spatial Information Engineering Technical Training" as a prerequisite. Supplemental class to Advanced Route Location to include trouble-shooting techniques and unit specific formats and requirements.	Complete a standard evaluation bi-monthly form to evaluate project data for completeness, transmission of data to correct agency, and compliance with established guidelines in a timely manner to be initialed and approved by supervisor. Successful completion of Advanced Route Location Course as identified in "Training Proposal for Spatial Information Engineering Technical Training" . Successful completion of Supplemental Trouble-shooting class.

ALL AO	4LS8	Level II PSD/Property Development (Math and CADD applications as applied to more complex properties with multiple alignments, multiple tracts)	3	3LS3	(Computation and Compilation of complex PSD and property files)	3	Min. (12 months - Field, 6 months - PS) OJT using Mentor and utilizing PSD Guideline Manual. Level I PSD Development is a prerequisite. Attend Condemnation Exhibit Preparation class to include Statutory requirements.	Technician will compile a portfolio of 5 more complex PSD's in which he/she satisfactorily completed different phases of PSD development to be initialed and approved by supervisory team utilizing a standardized form. More complex would be defined as a PSD with multiple complex alignments, multiple areas of takes of different varieties (R/W, PDE, TCE,etc.), more difficult decisions involving older deeds and easements. Successful completion of Condemnation Exhibit Preparation class to include Statutory requirements.
ALL AO	4LS9	GPS Mapping Grade Operation (Trimble Pathfinder)	All	8LS1, 2LS7	Operate/Process Mapping Grade GPS receivers in asset/feature location	3	Pathfinder Office Training (GIS 255)	Completion of class and application of equipment usage at survey test site