

January 15, 2019

Karie Friling Assistant Village Manager Village of Orland Park 14700 Ravinia Avenue Orland Park, IL 60462

Re: Professional Services Proposal – Phase I Engineering Services

167th Multi-Use Trail – Steeplechase Pkwy to 104th Avenue

Dear Ms. Friling:

On behalf of V3 Companies, we are pleased to submit this proposal for Phase I engineering services on the above-referenced project. If you find this proposal to be acceptable, the executed copies of this letter, together with the General Terms and Conditions and Billing Rate Schedule attached hereto, which sets forth the contractual elements of this agreement, will constitute the entire agreement between the Village of Orland Park (CLIENT) and V3 for services on this project.

PROJECT UNDERSTANDING

It is our understanding that the CLIENT would like to complete a Phase I engineering report for a new multi-use path along 167th from Steeplechase Parkway to 104th Avenue. This path will connect the western-most development in Orland Park to the Grasslands at 104th Avenue. It will also connect to the existing 104th Avenue path that heads north connecting into the proposed path at 159th into Centennial Park. This route is highlighted in the Village's 2040 Transportation Plan. The Village is interested in seeking outside funding for Phase II Engineering, Construction and Construction Engineering, which in most cases requires Phase I engineering be completed to be eligible to apply. Invest in Cook funding does not require a Phase I study to be completed in order to apply, however having the study started does look favorable to Cook County when evaluating the applications. Recently V3 assisted the Village with three outside funding opportunities, Invest in Cook, Illinois Transportation Enhancement Program and ICC pedestrian crossing funds. Although, the Village did not receive funding through these resources, we will be submitting to all applicable sources as we develop this Phase I study.

The scope of work will include preliminary engineering and environmental studies consistent with Phase I study procedures that are part of the National Environmental Policy Act (NEPA) and IDOT requirements. This process is being followed in anticipation that federal or state funding may be used for Phase II design and Phase III construction and construction engineering of the path improvements.



Page 2 of 4
Karie Friling
Village of Orland Park
January 15, 2019

V3 services will include coordination with the Norfolk Southern Railroad, Metra and Illinois Commerce Commission (ICC) to obtain consensus of the proposed at-grade pedestrian crossing.

This proposal is comprised of V3 services associated with the preparation of a Phase I Engineering Study for a new multi-use path along 167th Street. The scope of work will include preliminary engineering and environmental studies consistent with Phase I study procedures that are part of the National Environmental Policy Act (NEPA), IDOT, Cook County and local requirements. The study Details of services that are to be provided by V3 can be found in Exhibit I that is attached to this proposal.

V3 Experience

This project requires a firm that has both company and individual experience and qualifications for trail/path projects that include multiple agencies - IDOT District 1 and Cook County Department of Highways. We are currently working with the Village of Schaumburg on a similar path project that is federally funded, administered by IDOT District 1 and coordinated with Cook County.

Members of our staff, specifically Kurt Corrigan have been involved, with the planning of this project for a number of years. With its connection to Orland Grasslands, the existing 104th path and future 108th path, the 167th path will provide a safe alternative mode of transportation to a variety of Village amenities including Centennial Park and 153rd Street Metra station.

COMPENSATION

The following is a breakdown of the costs for the anticipated tasks required to complete the Phase I engineering study. This work will be invoiced monthly on an hourly basis not to exceed the total amount. Manhour breakdown attached.

Task – F	Phase I Services	Fee Type	Total
Task I	Topographic Survey	Hourly	\$40,000.00
Task 2	Right of Way and Easement Research and Verification	Actual	\$20,000.00
Task 3	Data Collection	Hourly	\$2,000.00
Task 4	Railroad/ICC Coordination	Hourly	\$10,000.00
Task 5	Geotechnical Investigation	Actual	\$8,500.00
Task 6	Environmental Survey Request	Hourly	\$2,000.00
Task 7	Traffic/Capacity Analysis	Hourly	\$6,000.00
Task 8	Alternate Geometric Studies	Hourly	\$10,000.00
Task 9	Location Drainage Study	Hourly	\$32,000.00
Task 10	Wetland Delineation/Assessment and Impact	Hourly	\$7,000.00



	Evaluation		
Task II	Hydraulic Report	Hourly	\$15,000.00
Task 12	Marley Creek Structure Inspection and Bridge Condition Report and Type, Size and Location (TS&L)	Hourly	\$10,000.00
Task 13	Construction Cost Estimate	Hourly	\$2,000.00
Task 14	Project Development Report	Hourly	\$25,000.00
Task 15	Special Waste Evaluation (PESA)	Hourly	\$3,800.00
Task 16	Quality Assurance/Quality Control	Hourly	\$3,500.00
Task 17	Meetings & Agency Coordination	Hourly	\$8,000.00
Task 18	Outside Funding Application Preparation and Application	Hourly	No Charge
Task 19	Administration and Management	Hourly	\$7,000.00
Total Fe	ee	-	\$211,800.00

Miscellaneous Exhibits

Scope of Services and Manhour Breakdown – Exhibit I
V3 Standard Billing Rate Schedule – Exhibit II
General Terms and Conditions – Exhibit III
Project Location Map – Exhibit IV

If Additional Services are required, they will be the subject of a separate agreement or amendment to this agreement. This may include updates to the project report for expiring items such as wetland delineation, crash analysis and traffic counts.

PROJECT SCHEDULE

Upon a notice to proceed, V3 will coordinate a project initiation meeting with IDOT. We anticipate the project to be completed within 12-18 months after our initial meeting with IDOT.

SUMMARY

V3 will initiate its services promptly upon receipt of CLIENT's acceptance of this proposal and receipt of all requested information to be provided by the CLIENT.

If the CLIENT or other interested parties request a computer flash drive of the Phase I study, V3 shall be indemnified from any claims arising out of the accuracy, misuse or reuse by others of the data delivered in disk form.



Page 4 of 4 Karie Friling Village of Orland Park January 15, 2019

This agreement, together with the Scope of Services, Billing Rate Schedule and General Terms and Conditions attached hereto, represents the entire understanding between the Client and V3. If the terms of this agreement are found to be satisfactory, please sign this agreement in the space provided and return one signed copy to our office. Receipt of the signed authorization will serve as our Notice to Proceed for this work.

We appreciate the opportunity to present this proposal and look forward to working with you on this project.

Sincerely, V3 COMPANIES OF ILLINOIS, LTD.	Accepted For: VILLAGE OF ORLAND PARK
Hele	
	Authorized Signature
Kurt Corrigan, P.E.	PRINTED
Municipal Market Leader	
0/-1-	TITLE
Vinent & Selmed	
V	DATE
Vincent J. Del Medico, P.E.	
Director of Transportation and Municipal	
Engineering	

Attachments



EXHIBIT I SCOPE OF SERVICES

Phase I Engineering & Environmental Studies 167th Street Multi-Use Path - Steeplechase Parkway to 104th Avenue

Project Description

The proposed multi-use path along 167th Street is located in the Village of Orland Park and extends from Steeplechase Parkway to 104th Avenue. The path will be located along the south side of 167th and will include the extension of the Marley Creek structure located at the intersection of Wolf Road and 167th Street, any pedestrian signal improvements necessary at the signalized intersections, an at-grade RR crossing just east of 108th Avenue and potentially retaining walls along the route to limit the ROW necessary to build the path. The scope of work will include preliminary engineering and environmental studies consistent with Phase I study procedures that are part of the National Environmental Policy Act (NEPA) and IDOT requirements. This process is being followed in anticipation that federal or state funding may be used for Phase II design and Phase III construction and construction engineering of the path.

V3 services will include meetings and negotiations with the Norfolk Southern Railroad and the Illinois Commerce Commission (ICC) to obtain approval for the proposed pedestrian crossing just east of 108th Avenue.

Task 1 - Topographic Survey

A topographic survey will be conducted within a survey area of the right-of-way for 167th Street from Steeplechase Parkway to 104th Avenue. This includes an additional 20 ft south of the south right of way of 167th Street. Full intersection topography will be taken at the intersections of Steeplechase Parkway, Wolf Road, 108th Avenue and 104th Avenue. Minor side street topography will be conducted to approximately 100 ft south of the 167th edge of pavement. Included is the topographic survey of the Marley Creek Structure and associated Creek information. The topographic survey services will include the following:

- 1. Record a minimum of two permanent benchmarks at the site. Elevations will be referenced to a datum commonly used at the site. Typical datum's used are the National Geodetic Vertical Datum of 1929 (NGVD29), and the North American Vertical Datum of 1988 (NAVD88). If an assumed local or other datum is used, an equation relating said datum to NGVD, or NAVD may be indicated on the survey. Description of location and elevation of the source benchmark to which the topographic surveying and site benchmarks are tied to, will be indicated on the survey.
- 2. A contour survey with 1'-0" contour intervals will be prepared from field spot elevations. Spot elevations obtained in the field will be of sufficient quantity to generate a contour survey, which properly represents the ground surface. Additional elevations will be indicated on the survey as required to establish accurate profiles (including all changes or breaks in grade) and cross-sections of walks, curbs, gutter, pavement edges, and centerlines.



- 3. Spot elevations will be shown to the nearest 0.01 foot on all "hard surfaces" and utility structures. Spot elevations in unpaved areas such as grass and dirt shall be accurate to the nearest 0.1 foot.
- 4. Pavement types such as concrete, asphaltic concrete, gravel, etc. will be indicated.
- 5. Existing improvements, such as mailboxes and signs shall also be located.
- 6. Individual parkway trees of 3" diameter or greater (callipered 4'± above the ground) will be located within one foot tolerance. Where groups of trees exist, the perimeter outline only of the tree grove will be shown.
- 7. V3's International Society of Arboriculture (ISA) certified arborist will identify all trees 6" DBH and greater within the project area. The trees will be tagged as part of V3's topographic survey scope of services. The tag number, diameter, and tree species will be recorded for each tree identified. A rating will be assigned to each tree which will consider the size, species, condition, location, and aesthetics of each. A summary table will be prepared listing the scientific name, common name, DBH, and rating of each tree identified.

The information provided by V3 regarding tree quality is based on an interpretation of observed tree growth habit and health at the time of the field investigation. V3 provides the best information available at the time of the field investigation, but outside factors may affect tree characteristics with time, including weather, vegetation maintenance, altered drainage, disease, or other events.

- 8. Mean elevations of water in retention ponds, lakes, or streams will be shown as depicted at the time the survey field work was conducted.
- 9. Top of curb, flow line, and edge of pavement elevations of all roadways and streets within the survey area shall be shown.
- 10. The centerline profile of the road and certain utility conflicts may be shown in the profile section of the drawing. This shall be negotiated with the client.
- 11. Right-of-way lines shall be established from existing monumentation and record drawings.
- 12. Marley Creek cross sections, streambed determination and structure opening determination.

Utilities

The Topographic Survey shall incorporate information on existing utility systems adjoining or contained within the Survey Area which are obtained from Village departments or utility companies responding to written or verbal requests for utility records through the Joint Utility Locating Information for Excavators (J.U.L.I.E.) Design Stage/Planning Information Process and available for the surveyors use at the time of the survey. Records or Atlas information that is provided to V3 after completion of the survey can be provided to the CLIENT or engineer.

Field markings by J.U.L.I.E. members, which are coordinated by others, shall be shown on the survey if present and practical at the time of survey.



The following list contains typical information provided for the specific utilities located which are above ground and visible at the time of the survey. Snow cover, earth or construction debris covering typically above ground structures may not be located.

- 1. Sanitary and Storm Sewers: Size, type and direction of pipes; rim and invert elevations. Location of manholes, inlets, catch basins, and end sections.
- 2. Water Mains: Size, type and direction of pipes, top of pipe elevations at valve vault locations, location of valves and hydrants.
- 3. Gas Mains: Location of valves and mains if marked in the field at the time of the survey.
- 4. Telephone, Electric, and Cable TV pedestals, and transformers.
- 5. Traffic and Street Light poles and cables if marked in the field at the time of the survey.
- 6. Visible evidence of field tiles or those marked in the field at the time of the survey.
- 7. Other utilities not listed above and occurring within the Survey Area will be shown in a similar manner.

Utilities and improvements shall be shown based on visible field verified structures, in coordination with atlas information provided by utility companies through J.U.L.I.E.'s design stage process, if available. V3 shall only show underground utility lines between structures that are located in the field and appear to be connected. In areas where structures are not shown connected, V3 recommends that the CLIENT contract a specialist to perform a die test or other sub terrain exploratory test.

Upon completion of survey, base sheets will be prepared in Microstation in accordance with IDOT's "CADD Standards" and "CADD Roadway Drafting Reference Guidelines".

Task 2 – Right of Way and Easement Research and Verification

In addition to the topographic survey V3 will verify actual right of way and easements for each parcel along the corridor. Although not required during the Phase I process we have found establishing the actual ROW and easements early in the process helps to better evaluate alternatives and the impacts they may have on the existing ROW and easements. We are anticipating acquiring 40 title reports for this task. Each report and title commitment research will cost \$500 per parcel.

Task 3 - Data Collection

Pertinent information for the project will be obtained from the Village. This information will include:

- any available aerial photography
- as-built plans
- right-of-way plats
- plans for new developments including any stormwater management or hydraulic studies
- accident records
- utility mapping



Marley Creek regulatory model

The design team will conduct a field review of site conditions and prepare a photographic log of the project site.

Task 4 - Railroad/ICC Coordination

V3 will assist the Village in meetings and coordination with the Norfolk Southern Railroad, Cook County, IDOT, and the ICC to obtain approval for the proposed at-grade pedestrian crossing. Early coordination with the railroad is recommended to understand what may be required for the railroad to approve a new at-grade crossing.

Preliminary engineering will be performed to determine the alignment, profile and width at the grade crossing. We anticipate grade crossing warning devices and gates and crossing surface materials will be required by the railroad, County and IDOT. The scope will include two meetings with each of the agencies to define railroad requirements, determine needed crossing improvements and review preliminary plans and installation costs.

A formal petition and hearing with the ICC will be required to obtain approval for the at-grade crossing. V3 will develop documentation and exhibits needed for the petition and hearing and provide the necessary testimony at the hearing in support of the Village's request for a new at-grade pedestrian crossing. We anticipate that an Intergovernmental Agreement between the Village and Cook County will be necessary for the cost of construction and maintenance of the new crossing.

Task 5 - Geotechnical Investigation

V3 will hire Rubino Engineering, a geotechnical subconsultant, to perform 12 soil borings and prepare a geotechnical report to determine the suitability of the soils for the construction of any retaining walls, extension of the Marley Creek drainage structure and the path. The borings will also be utilized for the Special Waste evaluation discussed later in this proposal.

Task 6 - Environmental Survey Request

V3 will prepare and submit the Environmental Survey Request Form (ESRF) to IDOT following the ESR Guidelines provided by IDOT, which will include the following exhibits:

- Location Map
- Aerials exhibits or CADD drawings with anticipated proposed ROW
- Photos of all buildings constructed prior to 1960
- NWI Maps

V3 will coordinate with IDOT staff and provide additional information as required. The IDOT Central Office will perform the necessary coordination with the involved environmental and cultural agencies and provide the appropriate results to obtain an inventory of the affected environment and identify any potential issues that the project may need to address as part of required environmental studies.



V3 will photograph, research and document all building structures that were constructed prior to 1960. Digital photographs will be taken in the field and included in the ESRF.

Task 7 - Traffic/Capacity Analysis

Although the proposed improvements do not involve vehicular movements we anticipate that IDOT and/or Cook County will require a capacity analysis at the intersections of 167th/Wolf Road and 167th/108th Avenue to in order to incorporate the new pedestrian signals. At the 167th/104th Avenue intersection pedestrian signals currently exist and will be utilized with this improvement.

V3 will collect weekday am (7:00-9:00 am) and weekday pm (4:00-6:00 pm) peak period traffic volumes for the intersections of 167th/Wolf Road and 167th/108th Avenue. The weekday peak hour counts will be collected on a Tuesday, Wednesday, or Thursday during dry weather and a non-holiday week.

Accident records furnished by IDOT, County and the Village for the most recent five-year period will be collected and analyzed to identify if there is a history of any pedestrian accidents. The alternate geometric studies will take into account the type of pedestrian accidents along the corridor, if applicable.

Signal timings and turn lane storage lengths may need to be adjusted depending on the affects the pedestrian signals and crosswalk locations have on the intersection operations. V3 will prepare a technical memorandum with appropriate graphics to present the potential impacts and necessary improvements.

Task 8 - Alternate Geometric Studies

Alternate geometric studies will be performed to develop a preferred path alignment and intersection improvements along the south side of 167th Street. Path geometrics will be evaluated to minimize impacts to right-of-way, utilities, environmentally sensitive areas, railroad facilities and the Marley Creek drainage structure.

Cross section studies will be performed in order to define any right-of-way and easements required for path improvements. These will be utilized to evaluate the vertical and horizontal needs of any retaining walls required.

We anticipate that a retaining wall will be required from Wolf Road to Lee Street. If the wall is 7 ft in height or greater a Type, Size and Location (TS&L) drawing will be required as part of the Phase I study. There may be additional areas that require a retaining wall but we anticipate that these locations to be less than 7 ft in height and therefore TS&L's will not be required.

Task 9 - Location Drainage Study

A Location Drainage Study (LDS) will be prepared in accordance with IDOT's Drainage Manual. The study will include a description of the existing and proposed drainage systems, identification



of outfall locations and their adequacy, and calculation of storm water detention volumes based on IDOT and Cook County criteria.

The study will include required mapping and exhibits, design of the drainage system and storm water detention, a discussion of Best Management Practices (BMPs) (if applicable), and identification of permitting requirements. Although the existing and proposed drainage exhibits typically only include the proposed limits of the project, it may be necessary to study areas outside the projects limits due to the potential for tailwater impacts of extending the Marley Creek box culvert. As such, additional survey and/or field investigations outside of the ROW may be required to confirm off-site drainage routes and capacity. Specifically, surveyed cross sections 1000 feet upstream and downstream of the Marley Creek culvert crossing will be required. Additionally, there is an existing culvert crossing of the Norfolk Southern RR line that may be impacted by the path crossing location of the RR.

V3 will coordinate with MWRD to verify design and permitting requirements under the Watershed Management Ordinance (WMO). We anticipate that stormwater detention volume, volume control, and site runoff requirements are <u>not</u> applicable. Correspondence and meeting notes will be prepared to document coordination with IDOT, MWRD, and/or local agencies.

Task 10 - Wetland Delineation/Assessment and Impact Evaluation

Wetland Delineation V3's Wetland Specialists from our Natural Resources Division will conduct a field investigation during the 2019 Cook County growing season (May 15-October 15) to locate and delineate wetlands in accordance with the *Regional Supplement to the Corps of Engineers Wetlands Delineation Manual: Midwest Region.* The limits of any delineated wetlands/Waters of the U.S. will be staked in the field, and approximate boundaries will be mapped on a recent large-scale aerial photograph, based on our field assessment of the vegetation, soils and hydrology at the site. The limits of any on-site wetland/Waters of the U.S. will be located using a handheld GPS unit during the field investigation portion of the wetland delineation. Professional survey of any wetland/Waters flags will be required for any future permitting that may be required.

<u>Wetland Assessment</u> Since wetlands/Waters of the U.S. are likely present on the site, wetland assessment is required by the U.S. Army Corps of Engineers, Chicago District (USACE) and the Village of Orland Park. Wetland assessment involves an evaluation of wetland characteristics, including wildlife habitat quality, water quality functions, and plant community quality. Wetland Assessment also includes a preliminary jurisdictional determination for isolated or adjacent wetland¹. Delineated wetlands will be rated as High Quality Aquatic Resources (HQAR's) in accordance with the USACE and MWRD, if applicable. V3 will prepare and submit the jurisdictional determination forms to the USACE for the wetlands/Waters of the U.S. identified at the site.

<u>Wetland Delineation Technical Report</u> A wetland report will be provided with the results of our field investigation, including the location and approximate size of wetlands/Waters of the U.S. present, a wetland quality evaluation, a Floristic Quality Assessment (FQA), and the wetland assessment. Floristic inventories and detailed soil classification data for each area investigated will be provided in the report. Areas determined to be wetland on the property

December 2, 2008, USEPA and Department of the Army Joint Memorandum, Clean Water Act Jurisdiction Following the U. S. Supreme Court Decision in Raponos v. United States and Carabell v. United States.



will be shown on a recent, large-scale aerial photo exhibit. USACE and MWRD/Orland Park wetland permitting and/or mitigation requirements will be addressed in the report. Wetland Impact Evaluation (WIE) forms (D1 PD0007) will be submitted for wetland areas that will be disturbed or filled by the proposed improvements. The forms will document the areas impacted and identify mitigation measures and will include exhibits showing their location and floristic quality rating.

Threatened & Endangered Species Consultation As required by the USACE and MWRD/Orland Park, V3 will conduct and complete the United States Fish and Wildlife (USFWS) Section 7 Federal threatened and endangered species consultation checklist for the site. V3 will also prepare and submit the required IDNR EcoCat for inquiry on State threatened & endangered species.

Task 11 - Hydraulic Report

Marley Creek crosses Wolf Road and 167th Street at a diagonal from NE to SW thru the intersection. In order to accommodate the new path the structure will need to be extended, requiring a hydraulic analysis of Marley Creek.

We understand that the proposed project will extend the existing box culvert crossing of Marley Creek located just west of Wolf Road. V3 will prepare a Hydraulic Report for the proposed crossing in accordance with IDOT's Drainage Manual. This will include information and calculations regarding regulatory, natural, modified existing and proposed hydraulics, compensatory storage analysis, and permit requirements. The modeling effort is assumed to only include the regulatory modeling. V3 assumes that an existing regulatory model of Marley Creek at 167th Street is available and that a new model will <u>not</u> need to be created.

The report will include required data sheets and exhibits, correspondence, and meeting notes to document any coordination with regulatory agencies. The report will follow requirements of Section 2-701 of IDOT's Drainage Manual and will include the hydraulic report outline, hydraulic report data sheets and program output results. The hydraulic survey includes the size, type and opening of the existing structure and cross sections of Marley Creek 1000 feet up and downstream of the culvert. The survey work is included under the topographic survey task.

Task 12 – Marley Creek Structure Inspection, Bridge Condition Report and Type, Size and Location (TS&L)

V3 will perform field inspections and prepare an abbreviated Bridge Condition Report (BCR) and TS&L for the structure over Marley Creek at the intersection of 167th Street and Wolf Road. The field inspection will document the existing condition of the structure, wing walls, railings and guardrail. The BCR and TS&L will summarize the results of field investigations, provide recommendations for rehabilitation repairs and widening improvements and estimate probable construction costs. The report will be submitted to IDOT and County for review and approval.



Task 13 - Construction Cost Estimate

V3 will prepare a preliminary engineer's opinion of probable construction costs (EOPCC) of the proposed improvements utilizing IDOT pay items, railroad workforce costs and the Village's standards and guidelines. Itemized costs will be determined using available guides and bid tabulations from similar projects. In addition, the pay item reports with awarded prices from IDOT's website will be used to approximate current unit costs.

Task 14 - Project Development Report

A Project Development Report (PDR) for a Group II Categorical Exclusion will be prepared following IDOT's report format using BLR Form 22210. The report will include a description of existing conditions, proposed improvements, traffic and capacity analysis, right-of-way/easement required, identified environmental concerns and impacts, maintenance of traffic during construction and agency coordination/public involvement activities. Exhibits that will be prepared and incorporated into the project report will include:

- Location Map
- Existing and Proposed Typical Sections
- Proposed Plan and Profile sheets
- ADA Details at Each Intersection
- Pedestrian Signal Modifications or Additions
- Railroad Crossing Details
- Intersection Capacity Analysis
- Type Size and Location Retaining Wall and Marley Creek Structure
- Right-of-way and Easement Mapping
- Estimate of Probable Construction Cost

Two submittals of the PDR will be made to the Village of Orland Park (preliminary and final). Prior to the preliminary PDR submittal, conceptual typical proposed sections and plan and profile sheets will be submitted to the Village for review and comment. After receiving comments from the Village, the final PDR will be submitted to IDOT and Cook County for review and comment. A disposition of comments will be included with each submittal.

Task 15 - Special Waste Evaluation

A Preliminary Environmental Site Assessment (PESA) for the corridor will be prepared by the Illinois State Geological Survey (ISGS). The PESA will identify sites along 167th Street and the Norfolk Southern railroad right-of-way that are determined to have Recognized Environmental Conditions (REC). If excavation will be done within properties or right-of-ways with REC's, a Preliminary Site Investigation (PSI) will be required to identify the special waste involved, its extent and measures needed during construction to legally dispose of excavated earth and special waste materials.



Task 16 - Quality Assurance/Quality Control

V3 will perform in-house quality control reviews to ensure that the preliminary plans, cost estimates and PDR are prepared to meet the standards and guidelines for the plans or document required. These quality control reviews will occur prior to submittal of any deliverable to the Village, IDOT and County. The project manager will be responsible for the oversight of the QA/QC procedures and quality control reviews of the documents prepared for the project.

Prior to each submittal, V3's project manager will designate a quality assurance reviewer that has not been directly involved in the project to perform independent quality reviews. These reviews will include plan design reviews, reviews of supporting calculations and review of report documents.

The QA/QC process also includes the preparation and maintenance of project records. The process will ensure that records are legible, identifiable and retrievable; protected from damage or loss and are systematically filed in a singular location.

Task 17 - Meetings & Agency Coordination

V3 will attend a project kickoff meeting and progress meetings at the Village (6 total). We anticipate a project kick off meeting with IDOT and Cook County. Progress meetings with these agencies as well as coordination meetings with the FHWA are anticipated. (5 total). During the development of the PDR one open house or presentation at a Village Board Committee meeting will be held. We will confirm with IDOT that this will satisfy the public involvement requirements (1 total).

A separate kickoff meeting with the ICC and Village will be held to discuss the at grade pedestrian crossing of the Norfolk Southern railroad. In addition, we anticipate a project progress meeting and attendance at the necessary hearing for the crossing (3 total).

Meeting minutes will be taken and sent out within 5 days of the meeting.

V3 will send each utility owner a set of preliminary plans to verify the locations of their facilities. The intent in the design of the project is to avoid impacts to existing utilities to the extent feasible.

V3 will advise the Village regarding any required permitting that may be needed for the project during the Phase II design process.

Task 18 - Outside Funding Application Preparation

As outside funding opportunities become available V3 will assist the Village in completing the necessary documents and developing applicable exhibits. We anticipate submitting applications for STP, CMAQ, ITEP, ICC Safe Crossings and Invest in Cook funds



Task 19 - Administration & Management

Project administration and management will be performed by project manager and administrative staff.

- Prepare invoices and progress reports on a monthly basis and submit to the City for review and processing.
- Provide project and staff management. Coordinate project tasks between design team members and the geotechnical subconsultant.
- Conduct internal team meetings as necessary and provide procedures for documenting and filing of project information.
- Prepare a subconsultant agreement for geotechnical subconsultant and manage performance of their work efforts.



Village of Orland Park 167th Street Multi-Use Path Phase I Engineering Manhour Summary

V3 Companies 15-Jan-19

ITEM	MANHOURS	IN-HOUSE DIRECT COSTS	SERVICES BY OTHERS
Topographic Survey	370.5		
ROW and Easement	0	\$ 20,000.00	
Data Collection	16		
RR/ICC Coordination	72		
Geotechnical Investigations	0		\$ 8,500.00
Environmental Survey Request	16		
Traffic/Capacity Analysis	40		
Alt. Geometric Studies	122		
Location Drainage Study	365		
Wetland Assessment	56		
Hydraulic Report	149		
Marley Creek Structure	104		
Construction Cost	40		
Project Report	184		
Special Waste Study (PESA)	10		
QA/QC	16		
Meetings/Agency Coordination	66		
Outside Funding Application	32		
Admin/Management	32		
Subconsultant DL			
TOTALS	1690.5	\$ 20,000.00	\$ 8,500.00

PAYROLL	TOTAL PROJECT HOURS	Topographic Survey			ROW and Easement			Data Collection			RR/ICC Coordination			Geotechnical Investigations		
		Hours			Hours			Hours			Hours			Hours		
CLASSIFICATION																
Administration I	13															
Design Technician III	4															
Division Director	4															
Engineer I	151															
Ingineer II	297															
ngineer III	8										8					
Project Engineer I	180		Ī					16			40					
Project Engineer II	198															
Project Manager	135															
Project Surveyor II	16															
Project Surveyor III	80	80														
Senior Project Engineer	80															
Senior Project Manager	86.5	22.5														
Senior Project Manager (Trans.)	154										24					
Superintendent	0															
Survey Crew	268	268														
echnician I/II	0															
echnician II	0															
	16															
	0															
	0															
	0															
	0															1
	0															1
	0															1
	0															1
	0															
TOTALS	1690.5	370.5			0			16			72			0		

PAYROLL	Environmen	tal Survey Requ	uest Traffic/C	apacity Analysi	s	Alt. Geomet	ric Studies	Location Dra	ainage Study	Wetland Ass	sessment	Hydraulic R	eport	
	Hours		Hour			Hours		Hours		Hours		Hours		
CLASSIFICATION														
Administration I								8				5		
Design Technician III								4						
Division Director												4		
Engineer I						50		37				24		
Engineer II								205				92		
Ingineer III														
Project Engineer I														
Project Engineer II	16		24			40				16				
Project Manager								111				24		
Project Surveyor II			16											
Project Surveyor III														
Senior Project Engineer														
Senior Project Manager						16				24				
Senior Project Manager (Trans.)						16								
Superintendent														
Survey Crew														
Technician I/II														
echnician II														
Scientist III										16				
				ĺ										
				ĺ										
	İ			İ										
TOTALS	16		40	1	1	122		365		56	l	149		l

Hours Hour	PAYROLL	Marley Cree	Marley Creek Structure		Constructio	n Cost	Hydraulic Re	eport	Special Was	te Study (PE	SA)	QA/QC		Meetings/Ag	ency Coord	ination
CLASSIFICATION Administration I Design Technician III Design Techn							_			, , , , , , , , , , , , , , , , , , ,	,				,,	
Design Technician III Division Director Engineer I Engineer II Engineer II Engineer II Project Engineer II Project Engineer II Project Surveyor II Project Surveyor II Senior Project Manager Senior Project Manager Superintendent Survey Crew Enchician III	CLASSIFICATION															
Division Director	Administration I															
Division Director	Design Technician III															
Engineer II																
Engineer III Project Engineer I Project Engineer II Project Engine	Engineer I						40									
Engineer III																
Project Engineer																
Project Engineer	Project Engineer I				24		60							40		
Project Surveyor II Project Surveyor III Senior Project Engineer 80 Senior Project Manager (Trans.) Senior Project Manager (Trans.) Survey Crew III Survey Cre	Project Engineer II						60		10							
Project Surveyor II	Project Manager															
Project Surveyor III	Project Surveyor II															
Senior Project Engineer 80	Project Surveyor III															
Senior Project Manager 24	Senior Project Engineer															
Survey Crew <td< td=""><td>Senior Project Manager</td><td>24</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></td<>	Senior Project Manager	24														
Survey Crew <td< td=""><td>Senior Project Manager (Trans.)</td><td></td><td></td><td></td><td>16</td><td></td><td>24</td><td></td><td></td><td></td><td></td><td>16</td><td></td><td>26</td><td></td><td></td></td<>	Senior Project Manager (Trans.)				16		24					16		26		
Survey Crew	Superintendent															
Fechnician I/I Image: Company of the comp	Survey Crew															
	Гесhnician I/II															
	Technician II															
	·															
TOTALS 104	TOTALS															

PAYROLL	Outside Fur	nding Applica	tion	Admin/Man	agement									
	Hours			Hours		Hours		Hours		Hours		Hours		
CLASSIFICATION														
Administration I														
Design Technician III														
Division Director														
Engineer I														
Engineer II														
Engineer III														
Project Engineer I			,										-	
Project Engineer II	32		,										-	
Project Manager														
Project Surveyor II														
Project Surveyor III														
Senior Project Engineer														
Senior Project Manager														
Senior Project Manager (Trans.)				32										
Superintendent														
Survey Crew														
Technician I/II														
Technician II														
			,										-	
·														,
			,											
TOTALS	32			32		0		0		0		0		

Exhibit II



V3 COMPANIES BILLING RATE SCHEDULE

(Rates effective January 1, 2019 through December 31, 2019)

<u>Description</u>	Hourly Rate
Principal/Director	210.00
Senior Project Manager	200.00
Senior Estimator	190.00
Superintendent	170.00
Resident Engineer II	165.00
Project Manager II	160.00
Resident Construction Manager II	160.00
Project Manager I	150.00
Resident Engineer I	145.00
Resident Construction Manager I	145.00
Senior Project Engineer	140.00
Construction Administrator III	140.00
Project Engineer II	135.00
Project Scientist II	130.00
Project Engineer I	130.00
Landscape Architect II	120.00
Senior Construction Technician	120.00
Project Scientist I	115.00
Landscape Architect I	110.00
Construction Technician III	110.00
Survey Crew Chief	110.00
Project Surveyor III	110.00
Engineer III	105.00
Project Surveyor I/II	105.00
Design Technician III	100.00
Construction Administrator II	100.00
Scientist III	100.00
Engineer II	95.00
Engineer I	95.00
Instrument Operator	90.00
Project Designer III	90.00
Scientist I/II	90.00
Technician II	80.00
Project Designer I/II	80.00
Estimating Technician	80.00
Project Coordinator	60.00
Technician I	60.00



EXHIBIT III

V3 COMPANIES GENERAL TERMS AND CONDITIONS

1. CLIENT'S RESPONSIBILITIES

CLIENT shall do the following in a timely manner so as not to delay the services of CONSULTANT.

- a. Provide all criteria and full information as to CLIENT's requirements for the Project, including design objectives and constraints, borings, probings and subsurface explorations, hydrographic surveys, laboratory tests, environmental assessment and impact statements, property, boundary, easement, right-of-way, topographic and utility surveys, property and legal descriptions, zoning, deed and other land use restrictions; all of which CONSULTANT may use and rely upon in performing services under this Agreement.
- b. Arrange for access to and make all provisions for CONSULTANT to enter upon public and private property as required for CONSULTANT to perform services under this Agreement.
- c. Give prompt written notice to CONSULTANT whenever CLIENT observes or otherwise becomes aware of any development that affects the scope or timing of CONSULTANT's services, or any defect or non-conformance in the work of any Contractor.

2. CONSULTANT'S RESPONSIBILITIES

CONSULTANT will render engineering services in accordance with generally accepted and currently recognized engineering practices and principles. CONSULTANT makes no warranty, either expressed or implied, with respect to its services.

- a. Notwithstanding anything to the contrary which may be contained in this Agreement or any other material incorporated herein by reference, or in any Agreement between the CLIENT and any other party concerning the Project, the CONSULTANT shall not have control or be in charge of and shall not be responsible for the means, methods, techniques, sequences or procedures of construction, or the safety, safety precautions or programs of the CLIENT, the construction contractor, other contractors or subcontractors, other than its own activities or own subcontractors in the performance of the work described in this agreement. Nor shall the CONSULTANT be responsible for the acts or omissions of the CLIENT, or for the failure of the CLIENT, any architect, engineer, consultant, contractor or subcontractor to carry out their respective responsibilities in accordance with the Project documents, this Agreement or any other agreement concerning the Project. Any provision which purports to amend this provision shall be without effect unless it contains a reference that the content of this condition is expressly amended for the purposes described in such amendment and is signed by the CONSULTANT.
- b. CLIENT reserves the right by written change order or amendment to make changes in requirements, amount of work, or engineering time schedule adjustments, and CONSULTANT and CLIENT shall negotiate appropriate adjustments acceptable to both parties to accommodate any changes.
- c. The CONSULTANT will be responsible for correctly laying out the design data shown on the contract documents where construction staking services are a part of this Agreement. The CONSULTANT is not responsible for, and CLIENT agrees herewith to hold CONSULTANT harmless from any and all errors which may be contained within the Contract Documents. It is expressly understood that the uncovering of errors in the plans and specifications is not the responsibility of the CONSULTANT and any and all costs associated with such errors shall be borne by others.

3. TERMS OF PAYMENT

CONSULTANT shall submit monthly statements for Basic and Additional Services rendered and for Reimbursable Expenses incurred, based upon CONSULTANT's estimate of the proportion of the total services actually completed at the time of billing or based upon actual hours expended during the billing period. CLIENT shall make prompt monthly payments in response to CONSULTANT's monthly statements.

If CLIENT fails to make any payment due CONSULTANT for services and expenses within thirty (30) days after receipt of CONSULTANT's statement therefore, the past amounts due CONSULTANT will be increased at the rate of 1.5% per month from said thirtieth day. CONSULTANT may after giving seven days written notice to CLIENT, suspend services under this Agreement until CONSULTANT has been paid in full all amounts due for services, expenses and charges. CONSULTANT shall have no liability whatsoever to CLIENT for any costs or damages as a result of such suspension.

4. SUSPENSION OF SERVICES

CLIENT may, at any time, by written order to CONSULTANT require CONSULTANT to stop all, or any part, of the services required by this Agreement. Upon receipt of such an order CONSULTANT shall immediately comply with its terms and take all reasonable steps to minimize the occurrence of costs allocable to the services covered by the order. CLIENT, however, shall pay all costs associated with the suspension.

5. TERMINATION

This Agreement may be terminated by either party upon fourteen (14) days written notice in the event of substantial failure by the other party to perform in accordance with the terms hereof through no fault of the terminating party. This Agreement may be terminated by CLIENT, under the same terms, whenever CLIENT shall determine that termination is in its best interests. Cost of termination, including salaries, overhead and fee, incurred by CONSULTANT either before or after the termination date shall be reimbursed by CLIENT.

6. ATTORNEY'S FEES

In the event of any dispute that leads to litigation arising from or related to the services provided under this agreement, the prevailing party will be entitled to recovery of all reasonable costs incurred, including staff time, court costs, attorney's fees and other related expenses.

7. REUSE OF DOCUMENTS

All documents including but not limited to Reports, Drawings and Specifications prepared or furnished by CONSULTANT (and CONSULTANT's independent professional associates and consultants) pursuant to this Agreement are instruments of service in respect of the Project and CONSULTANT shall retain an ownership and property interest therein whether or not the Project is completed. CLIENT may make and retain copies for information and reference in connection with the use and occupancy of the Project by CLIENT and others; however, such documents are not intended or represented to be suitable for reuse by CLIENT or others on extensions of the Project or on any other project. Any reuse without written verification or adaptation by CONSULTANT for the specific purpose intended will be at CLIENT's sole risk and without liability or legal exposure to CONSULTANT, or to CONSULTANT's independent professional associates or consultants, and CLIENT shall indemnify and hold harmless CONSULTANT and CONSULTANT's independent professional associates and consultants from all claims, damages, losses and expenses including reasonable attorney's fees and costs of defense arising out of or resulting therefrom. Any such verification or adaptation will entitle CONSULTANT to further compensation at rates to be agreed upon by CLIENT and CONSULTANT.

8. INSURANCE

Upon CLIENT request the CONSULTANT shall provide the CLIENT with certificates of insurance evidencing all coverages held by the CONSULTANT.

In order that the CLIENT and the CONSULTANT may be fully protected against claims, the CLIENT agrees to secure from all CONTRACTORS and SUBCONTRACTORS working directly or indirectly on the project, prior to the commencement of work of any kind, a separate policy of insurance covering public liability, death and property damage naming the CLIENT and the CONSULTANT and their officers, employees and agents as additional insureds, and that said CONTRACTOR and SUBCONTRACTORS shall maintain such insurance in effect and bear all costs for the same until completion or acceptance of the work. Certificates of said insurance shall be delivered to the CLIENT and to the CONSULTANT as evidence of compliance with this provision. However the lack of acknowledgment and follow-up by CONSULTANT regarding the receipt of said certificates does not waive CLIENT's and CONTRACTOR's obligation to provide said certificates.

9. FACSIMILE TRANSMISSIONS.

The parties agree that each may rely, without investigation, upon the genuineness and authenticity of any document, including any signature or purported signature, transmitted by facsimile machine, without reviewing or requiring receipt of the original document. Each document or signature so transmitted shall be deemed an enforceable original. Upon request, the transmitting party agrees to provide the receiving party with the original document transmitted by facsimile machine; however, the parties agree that the failure of either party to comply with such a request shall in no way affect the genuineness, authenticity or enforceability of the document. Each party waives and relinquishes as a defense to the formation or enforceability of any contract between the parties, or provision thereof the fact that a facsimile transmission was used.

10. CERTIFICATIONS, GUARANTEES AND WARRANTIES

CONSULTANT shall not be required to sign any documents, no matter by whom requested, that would result in the CONSULTANT having to certify, guarantee or warrant the existence of conditions whose existence the CONSULTANT cannot ascertain. CLIENT also agrees not to make resolution of any dispute with CONSULTANT or payment of any amount due to the CONSULTANT in any way contingent upon the CONSULTANT signing any such certification.

11. INDEMNIFICATION

CONSULTANT agrees to the fullest extent permitted by law, to indemnify and hold CLIENT harmless from any loss, cost (including reasonable attorney's fees and costs of defense) or expense for property damage and bodily injury, including death, caused by CONSULTANT's, or its employees' negligent acts, errors or omissions in the performance of professional services under this Agreement.

CLIENT agrees to the fullest extent permitted by law, to indemnify and hold CONSULTANT harmless from any loss, cost (including reasonable attorney's fees and costs of defense) or expense for property damage and bodily injury, including death, caused solely by CLIENT's, its agents or employees, negligent acts, errors or omissions in the performance of professional services under this Agreement

If the negligence or willful misconduct of both the CONSULTANT and CLIENT (or a person identified above for whom each is liable) is a cause of such damage or injury, the loss, cost, or expense shall be shared between CONSULTANT and CLIENT in proportion to their relative degrees of negligence acts, errors or omissions and the right of indemnity shall apply for such proportion.

12. WAIVER OF CONTRACT BREACH

The waiver of one party of any breach of this Agreement or the failure of one party to enforce at any time, or for any period of time, any of the provisions hereof, shall be limited to the particular instance, shall not operate or be deemed to waive any future breaches of this Agreement and shall not be construed to be a waiver of any provision, except for the particular instance.

13. LIMITATION OF LIABILITY

CLIENT and CONSULTANT have discussed the risks, rewards, and benefits of the project and the CONSULTANT's total fee for services. Risks have been allocated such that the CLIENT agrees that, to the fullest extent permitted by law, the CONSULTANT's total liability to the CLIENT for any and all injuries, claims, losses, expenses, damages, or claim expenses arising out of this agreement from any cause or causes shall not exceed \$100,000. Such causes include but are not limited to the CONSULTANT's negligence, errors, omissions, strict liability, or breach of contract.

14. CONTROLLING LAW

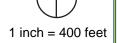
This Agreement is to be governed by the law of the State of Illinois.

15. CONSTRUCTION STAKING PROVISIONS

- a. The destruction of any point(s) labeled C.P. (control point) without the consent of the CONSULTANT will be charged as a non-contract item, at \$300.00 per incident. Control points will be marked, highly visible and identifiable by a "pig-pen" or "triple lath" configuration surrounding each control point.
- b. CONSULTANT will require a minimum of 48 hours notice for scheduling of survey crews. Once the crew is on site, crew will return for as long as required to finish the requested work. ADDITIONAL WORK given to crew, while crew is on-site, will be performed in a minimum of 48 hours. Scheduled surveying requests shall constitute a minimum of 4 hours of field work.
- c. It is understood that it is the CLIENT's responsibility to notify the CONSULTANT (in writing) of any and all revisions to the contract documents. Current blueline drawings for the project shall be supplied to CONSULTANT by CLIENT.
- d. If underground utility lines and/or curb lines are incorrectly constructed, and the CONSULTANT's stakes are claimed to be the source of error, the stakes in question MUST BE IN THE GROUND as set by the CONSULTANT in order that a re-verification of the location of the stakes can be accomplished.
- e. The CONSULTANT must be notified in writing within 24 hours of any potential staking error by the CLIENT so that the CONSULTANT may assess and verify the cause of the error. No claims shall be made as a result of a staking error against the CONSULTANT without the foregoing notification of the error in writing as specified.
- f. It is understood that the CONSULTANT will set offset stakes one time only, except as otherwise provided in this Agreement. A loss of a stake or stakes due to construction, vandalism, or an act of god will be replaced as an additional service to this Agreement. If the CONSULTANT is called upon to check or verify stakes that he has placed in the ground, and if it is found that those stakes were located and marked according to plan, the CONSULTANT's services will be considered an additional service to this Agreement.
- g. It is understood that it is not the responsibility of the CONSULTANT to verify the horizontal and/or vertical alignment of utility structures after they are built. Such services, should they be required by the CLIENT or the CONTRACTOR, will be provided as an additional service to this Agreement.
- h. CONSULTANT reserves the right to rely on the accuracy of the contract documents and is not responsible for the discovery of any errors or omissions that may exist on the contract documents.



167TH STREET - 550' WEST OF WOLF ROAD TO WOLF ROAD PROPOSED BIKE PATH IMPROVEMENTS PROJECT LOCATION MAP PAGE 1 OF 3

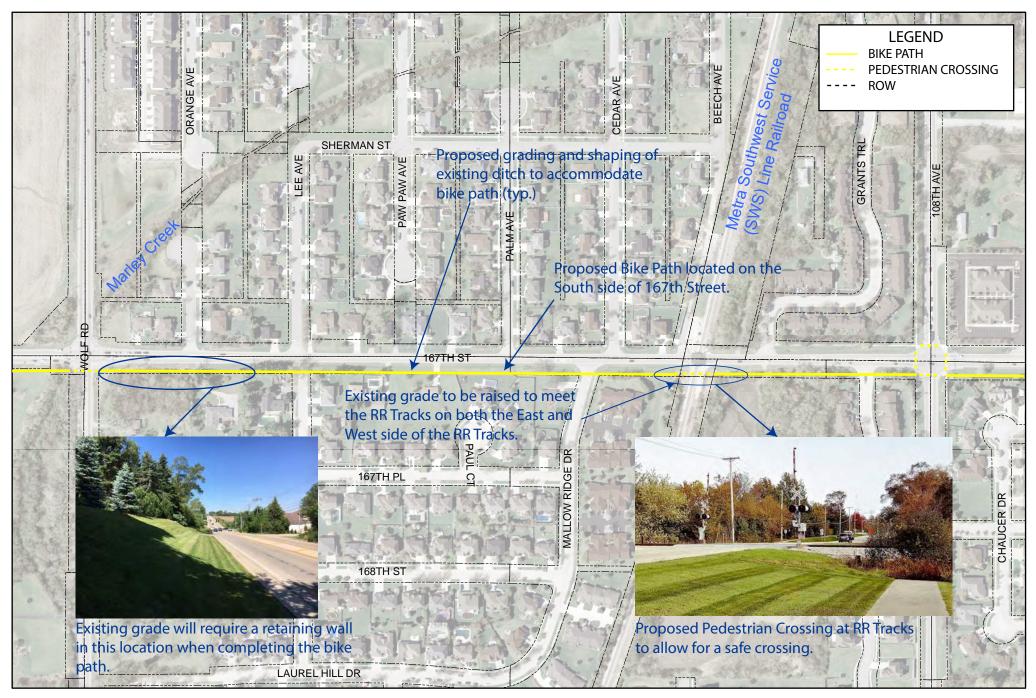


North

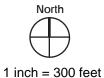
This map is for reference only. The Village makes no representations as to the accuracy of the depicted utility locations or sizes. The data is subject to change without notice. The Village of Orland Park assumes no liability in the use or application of the data.

Reproduction or redistribution is forbidden

Reproduction or redistribution is forbidden without the expressed written consent from the Village of Orland Park.

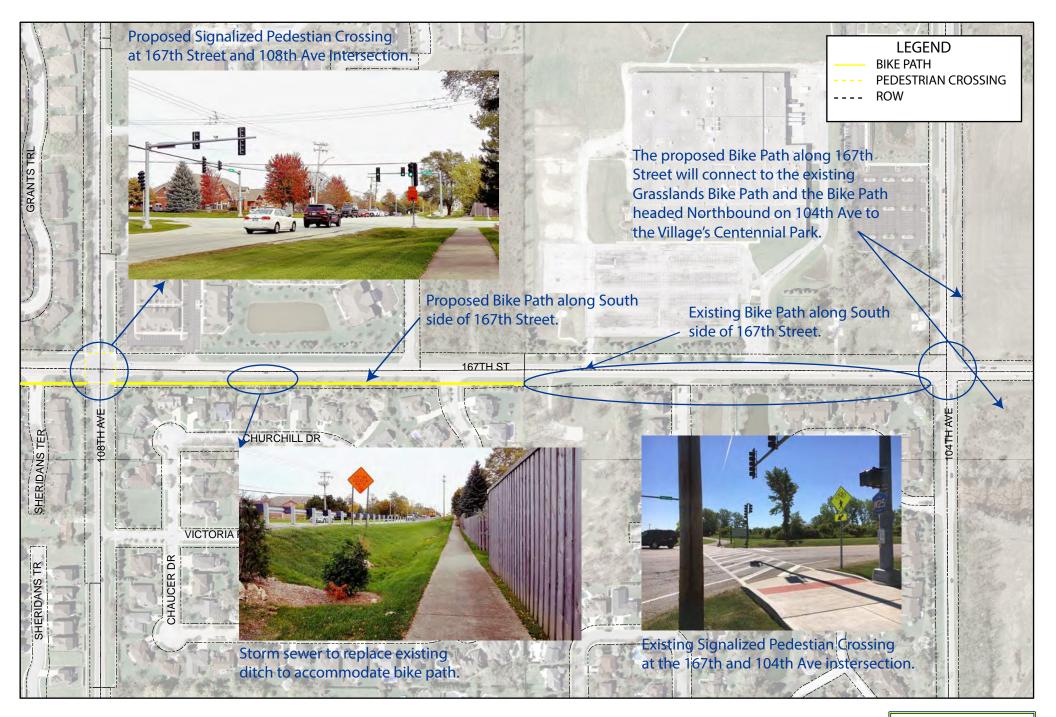


167TH STREET - WOLF ROAD TO 108TH AVE PROPOSED BIKE PATH IMPROVEMENTS PROJECT LOCATION MAP PAGE 2 OF 3 **EXHIBIT IV**

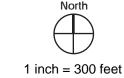


This map is for reference only. The Village makes no representations as to the accuracy of the depicted utility locations or sizes. The data is subject to change without notice. The Village of Orland Park assumes no liability in the use or application of the data.

Reproduction or redistribution is forbidden without the expressed written consent from the Village of Orland Park.



167TH STREET - 108TH AVE TO 104TH AVE PROPOSED BIKE PATH IMPROVEMENTS PROJECT LOCATION MAP PAGE 3 OF 3



This map is for reference only. The Village makes no representations as to the accuracy of the depicted utility locations or sizes. The data is subject to change without notice. The Villaget of Orland Park assumes no liability in the use or application of the data.

Reproduction or redistribution is forbidden without the expressed written consent from the Village of Orland Park.