



The neighborhood on N. 44th & Kelsey was flooded. VSM designed a stormwater transportation system that improves flow and prevents damage to homes.

VSM ENGINEERING HELPS YOU SOLVE YOUR PROBLEMS

WHAT YOU NEED

SITE DESIGN

Parking Lot Design
Site Grading & Drainage
Stormwater Analysis & Design
Underground Detention
SWPPP and Erosion Control
Utility Coordination
Water and Sanitary Sewer Line Design
Retaining Wall Design
Permitting
Specifications
Construction Inspection/Management

UTILITY COORDINATION

Over 35 completed projects in < 5 years

MoDOT On-Call list
2017- 2020

CONSULTING

SWPPP Inspections
CM Services
Quality Control
Peer Reviews

ALTERNATIVE DELIVERY METHODS

Design-Build &
CMAR Experience

STORMWATER

Storm Sewer Design
Green Infrastructure
Drainage Design & Studies
Capacity Studies
Detention Pond Design
Culvert Design
Hydrologic & Hydraulic Analyses
Floodplain Permitting
Stormwater Pollution Prevention Plans (SWPPP)

TRANSPORTATION

Street Rehabilitation
Stormwater and Drainage Design
Permitting
Specifications
SWPPP and Erosion Control
Quality Control Reviews
Construction Traffic Control

WATER SEWER

Water Main/Line Design
Sanitary Sewer Line Design
Utility Coordination
Permitting
Specifications

VSM Engineering, LLC is a professional civil engineering service firm providing general civil engineering services for local capital projects to clients in the public and private sectors.

MUNICIPAL INFRASTRUCTURE SERVICES:

- » Planning
- » Design
- » Analysis
- » Construction plans
- » Construction management

We specialize and tailor services for you.

CERTIFICATIONS

DBE

Missouri DOT
Kansas DOT

WBE

State of Missouri
Unified Government of Wyandotte County and Kansas City, KS

SLBE and DBE

City of Kansas City, MO

WOSB

U.S. Federal Government



The owner and President of VSM Engineering, Valerie is former Assistant City Engineer and former Roads Engineer with more than 20 years of experience on capital projects throughout Missouri, Kansas and Oklahoma.

VALERIE MCCAWE P.E., CFM
Civil Engineer/Project Manager

PE: MO, KS, OK | Envision Sustainability Professional
Certified Floodplain Manager

WE'VE GOT THE RIGHT TEAM



Sarah brings 15 years of experience in drainage, culvert, and storm sewer design projects for various municipal, residential, commercial, and highway projects. She is proficient in HEC-RAS and HydroCAD modeling and flood studies.

SARAH BEERS P.E.
Senior Civil Engineer QCIS, QPSWPPP



Formerly with the Water Services Division of the City of Kansas City, MO, for 35 years. Her extensive municipal experience includes utility coordination for more than 25 water, stormwater and roadway projects.

WILLA RUSSELL
Lead Utility Coordinator

WORKFORCE DIVERSITY

- » **RECRUITING** VSM is committed to a diverse workforce. We recruit new staff members from universities and technical colleges. Two of our staff members are recent engineer graduates. Minority and female employees are welcomed and represent over half of our team. We seek to empower people from all backgrounds.
- » **PEOPLE** Building a strong team comes from within. We have seasoned staff that mentor the newly recruited on a consistent basis. Each team member is enrolled in a professional society to help strengthen their professional and networking skills. VSM believes in investing in our people.
- » **PARTNER** We partner with a variety of firms whether big or small. One of our initiatives are building relationships and fostering a community where we can help others grow together. Our work is not just about ourselves but the people we partner and serve.



Matt is certified as a (QPSWPPP) allowing him the ability to prepare construction (SWPPP) in compliance with (NPDES) permit program. He is currently working as a Utility Coordinator on the KC Street Car Southern Extension.

MATT COMBS E.I.
Staff Engineer QCIS, QPSWPPP

EI: MO | OSHA 10 Card | Qualified Compliance Inspector of Stormwater | Qualified Preparer of Stormwater Pollution Prevention Plans



Mark has 5 years of experience working as a CMT tester. He is QCIS and QPSWPPP certified. Mark has performed quality control and quality assurance tests on multiple MoDOT and KDOT projects.

MARK MCINTYRE ENV SP
Environmental Permitting/ UC Support
Envision Sustainability Professional | OSHA 10 Card

EXPERIENCE

INTERCHANGE AT TIFFANY SPRINGS PARKWAY AND I-29, KANSAS CITY, MO

Utility coordination services for this project cooperative which included the KCI TIF Advisory Commission, MoDOT, the City of Kansas City, MO, and Platte County, MO. A standard Diamond Interchange was converted into a Diverging Diamond Interchange (DDI) and ramp water mains were relocated. VSM worked with local power, water, sanitary, sewer, telephone, fiber, telecom, and gas utilities to configure the best relocations for the redesigned interchange. The team's final plans were turned in ahead of MoDOT's schedule.

K-7 HIGHWAY IMPROVEMENTS AT 43RD AND 75TH STREETS, SHAWNEE, KS

Project manager for signal improvements at the intersection of K-7 Highway and 43rd Street. **Improvements included adding left turn signal and signal timing and replacing the existing mast arm for a longer arm of 60 feet.** VSM hired a structural engineer to design a new, non-standard pole base for the long mast arm. The project also included the installation of a permanent concrete median at the intersection of 75th and K-7 Highway and the addition of northbound and southbound left turn arrows at 43rd and K-7.

NORTH GARFIELD AVE REHABILITATION DESIGN-BUILD, KANSAS CITY, MO

Utility coordination for 1,935 LF of complete residential street reconstruction delivered by the design-build process.

RED BRIDGE ROAD OVER THE BLUE RIVER, KC, MO

VSM provided **utility relocation coordination for the widening of Red Bridge Road for approximately 3.1 miles from Holmes Road to Blue River Road.** The project included the replacement of a 1,000 LF bridge over the Blue River and selected intersection improvements.

KC STREETCAR UTILITY COORDINATION SOUTHERN EXTENSION, KANSAS CITY, MO

VSM provided utility coordination, engineering assistance, and SWPPP for the **3.5-mile KC Streetcar Southern Extension** that connects downtown towards the University of Missouri, Kansas City (UMKC).

KANSAS CITY PUBLIC SCHOOLS HEADQUARTERS PARKING LOT, KANSAS CITY, MO

As part of an IDIQ contract with the Kansas City Public Schools (KCPS), VSM Engineering provided design services for a new parking lot to service KCPS Headquarters staff and visitors. VSM Engineering led the project team and provided civil site design for the new parking lot located on the corner of E 29th Street and Forest Avenue. **The asphalt parking lot has 104-spaces – five of which are designed to meet ADA accessibility standards, lighting, interior landscaped islands, and an exterior fence with a gate located at each of the two driveway entries. The lot was designed using the new KCMO parking lot regulations. Existing large diameter trees were surveyed and incorporated into the new design.**



NORTH TROOST TRAIL, KANSAS CITY, MO

VSM Engineering served as the civil design engineer for **6,600 LF of trail from North Troost Avenue connecting Englewood Park to the North East Vivion Road Trail.** The **10-ft-wide trail was designed to meet ADA requirements and included culverts and a pre-fabricated 40-ft pedestrian bridge.** VSM performed a hydraulic analysis to size the culverts. FEMA Flood No-Rise certificate was obtained for the bridge. Through the analysis, VSM discovered cost-saving options by discarding one bridge crossing and using a smaller culvert. VSM also created the stormwater pollution prevention plan (SWPPP) for this project. Five entrance plazas with neighborhood sidewalk connections were included.

EXPERIENCE WITH LOCAL GOVERNMENT CLIENTS

Valerie, our Project Manager, brings a unique perspective with experience as both a former government employee and as an outside consultant. Valerie is a former Assistant City Engineer for Broken Arrow, Oklahoma and served as the Interim Engineer for Platte County, Missouri. She understands the unique and often varying requirements city staff work with every day.

Valerie has more than 20 years of experience serving municipal clients. She has performed in varying capacities from lead engineer to principal designer and project manager. She has extensive experience in management, design, and construction management of capital projects. Valerie's municipal clients are featured throughout our proposal and include:

- City of Riverside, MO
- Platte County, MO
- City of Grandview, MO
- City of Henrietta, MO
- City of Liberty, MO
- City of Kansas City, MO

MISSOURI MUNICIPAL SERVICES

VSM Engineering has provided engineering services to Missouri communities since our inception almost 20 years ago. VSM has developed valuable relationships with key partners, including government agencies, utility owners, and local professionals that will help you meet your goals.

VSM has provided services for the following Missouri government agencies:

- City of Riverside, MO
- Platte County, MO
- City of Grandview, MO (sub-contractor)
- City of Henrietta, MO
- City of Parkville, MO
- City of Kansas City, MO
- City of Liberty, MO
- Jackson County Sports Authority
- KC Streetcar Authority
- Missouri Department of Transportation (sub-contractor)

WHAT ARE OUR CLIENTS SAYING?

"I-29 and Tiffany Springs Parkway Interchange Improvements "VSM lead the utility coordination efforts for this project and they did an excellent job of organizing the meetings, communicating project goals and keeping the utility companies engaged in the relocation efforts... I am unaware of any significant utility conflicts during construction. I would eagerly engage VSM on similar projects in the future. Their work is outstanding."

Todd Thalman, TranSystems

"VSM Engineering has provided excellent stormwater and utility coordination services to the City's Stormwater Utility for many years. Their attention to detail on construction documents has consistently been excellent. Their utility coordination services are careful and thorough, and utility companies have complimented their coordination work to our group. VSM has also provided quality control and permit review services. Their comments are well-organized and easy to understand. VSM consistently brings a level of professionalism and excellence and we greatly appreciate their work."

Tom Kimes, KC Water Manager, Stormwater Engineering

"We have used VSM for utility coordination, drainage design, and traffic control design. Their staff does an excellent job with detailed engineering, coordination, and follow up. All coordination with utilities were performed professionally and exceptionally accomplished."

Sabin Yanez, CFS Engineers