

Original

THRASHER

06/15/16 09:34:44
WV Purchasing Division

West Virginia Division of Natural Resources
Watoga State Park Riverside Campground Wastewater Plant
CE01_0310_DNR1600000021



Submitted by:
THE THRASHER GROUP
June 16, 2016



Purchasing Division
 2019 Washington Street East
 Post Office Box 50130
 Charleston, WV 25305-0130

State of West Virginia
 Centralized Expression of Interest
 02 -- Architect/Engr

Proc Folder: 214528

Doc Description: Watoga-A/E services Riverside Campground Wastewater Plant

Proc Type: Central Contract - Fixed Amt

Date Issued	Solicitation Closes	Solicitation No	Version
2016-05-09	2016-06-16 13:30:00	CEOI 0310 DNR1600000021	1

BID CLERK

DEPARTMENT OF ADMINISTRATION

PURCHASING DIVISION

2019 WASHINGTON ST E

CHARLESTON

WV 25305

US

Vendor Name, Address and Telephone Number:

The Thrasher Group, Inc.
 P.O. Box 940 / 600 White Oaks Blvd.
 Bridgeport, WV 26330
 304-624-4108

FOR INFORMATION CONTACT THE BUYER

Guy Nisbet
 (304) 558-2596
 guy.f.nisbet@wv.gov

Signature X

FEIN # 55-0633596

DATE June 14, 2016

All offers subject to all terms and conditions contained in this solicitation

ADDITIONAL INFORMATION:

Expression of Interest

The West Virginia Purchasing Division is soliciting Expression of Interest for The Division of Natural Resources WVDNR, from qualified firms to provide architectural/engineering services to provide necessary engineering and other related professional services to design and provide construction contract administration services to replace a wastewater treatment plant at Watoga State Park as defined within the attached documentation.

INVOICE TO:	SHIP TO:
DIVISION OF NATURAL RESOURCES PARKS & RECREATION-PEM SECTION 324 4TH AVE SOUTH CHARLESTON WV25305 US	DIVISION OF NATURAL RESOURCES WEST VIRGINIA STATE PARKS 324 4TH AVE SOUTH CHARLESTON WV 25303-1228 US

Line	Comm Ln Desc	Qty	Unit Issue
1	Wastewater engineering		

Comm Code	Manufacturer	Specification	Model #
81101527			

Extended Description :

A/E services for the replacement of the Riverside Campground at Watoga State Park.

DESIGNATED CONTACT: Vendor appoints the individual identified in this Section as the Contract Administrator and the initial point of contact for matters relating to this Contract.

 (Name, Title)
 Wm. Randy Watson, Principal

 (Printed Name and Title)
 600 White Oaks Blvd. Bridgeport, WV 26330

 (Address)
 304-624-4108 / 304-624-7831

 (Phone Number) / (Fax Number)
 rwatson@thrashereng.com

 (email address)

CERTIFICATION AND SIGNATURE: By signing below, or submitting documentation through wvOASIS, I certify that I have reviewed this Solicitation in its entirety; that I understand the requirements, terms and conditions, and other information contained herein; that this bid, offer or proposal constitutes an offer to the State that cannot be unilaterally withdrawn; that the product or service proposed meets the mandatory requirements contained in the Solicitation for that product or service, unless otherwise stated herein; that the Vendor accepts the terms and conditions contained in the Solicitation, unless otherwise stated herein; that I am submitting this bid, offer or proposal for review and consideration; that I am authorized by the vendor to execute and submit this bid, offer, or proposal, or any documents related thereto on vendor's behalf; that I am authorized to bind the vendor in a contractual relationship; and that to the best of my knowledge, the vendor has properly registered with any State agency that may require registration.

 The Thrasher Group, Inc.
 (Company)

 (Authorized Signature) (Representative Name, Title)

 Wm. Randy Watson, Principal
 (Printed Name and Title of Authorized Representative)

 June 14, 2016
 (Date)

 304-624-4108 / 304-624-7831
 (Phone Number) (Fax Number)

STATE OF WEST VIRGINIA
Purchasing Division

PURCHASING AFFIDAVIT

MANDATE: Under W. Va. Code §5A-3-10a, no contract or renewal of any contract may be awarded by the state or any of its political subdivisions to any vendor or prospective vendor when the vendor or prospective vendor or a related party to the vendor or prospective vendor is a debtor and: (1) the debt owed is an amount greater than one thousand dollars in the aggregate; or (2) the debtor is in employer default.

EXCEPTION: The prohibition listed above does not apply where a vendor has contested any tax administered pursuant to chapter eleven of the W. Va. Code, workers' compensation premium, permit fee or environmental fee or assessment and the matter has not become final or where the vendor has entered into a payment plan or agreement and the vendor is not in default of any of the provisions of such plan or agreement.

DEFINITIONS:

"Debt" means any assessment, premium, penalty, fine, tax or other amount of money owed to the state or any of its political subdivisions because of a judgment, fine, permit violation, license assessment, defaulted workers' compensation premium, penalty or other assessment presently delinquent or due and required to be paid to the state or any of its political subdivisions, including any interest or additional penalties accrued thereon.

"Employer default" means having an outstanding balance or liability to the old fund or to the uninsured employers' fund or being in policy default, as defined in W. Va. Code § 23-2c-2, failure to maintain mandatory workers' compensation coverage, or failure to fully meet its obligations as a workers' compensation self-insured employer. An employer is not in employer default if it has entered into a repayment agreement with the Insurance Commissioner and remains in compliance with the obligations under the repayment agreement.

"Related party" means a party, whether an individual, corporation, partnership, association, limited liability company or any other form or business association or other entity whatsoever, related to any vendor by blood, marriage, ownership or contract through which the party has a relationship of ownership or other interest with the vendor so that the party will actually or by effect receive or control a portion of the benefit, profit or other consideration from performance of a vendor contract with the party receiving an amount that meets or exceeds five percent of the total contract amount.

AFFIRMATION: By signing this form, the vendor's authorized signer affirms and acknowledges under penalty of law for false swearing (W. Va. Code §61-5-3) that neither vendor nor any related party owe a debt as defined above and that neither vendor nor any related party are in employer default as defined above, unless the debt or employer default is permitted under the exception above.

WITNESS THE FOLLOWING SIGNATURE:

Vendor's Name: The Thrasher Group, Inc.

Authorized Signature: _____ Date: June 14, 2016

State of West Virginia

County of Harrison, to-wit: _____

Taken, subscribed, and sworn to before me this 14 day of June, 2016.

My Commission expires May 04, 2016.

AFFIX SEAL HERE

NOTARY PUBLIC _____



Purchasing Division
 2019 Washington Street East
 Post Office Box 50130
 Charleston, WV 25305-0130

State of West Virginia
 Centralized Expression of Interest
 02 - Architect/Engr

Proc Folder: 214528

Doc Description: Addendum No.01:Watoga-A/E-Riverside Campground Wastewater

Proc Type: Central Contract - Fixed Amt

Date Issued	Solicitation Closes	Solicitation No	Version
2016-06-07	2016-06-16 13:30:00	CEOI 0310 DNR1600000021	2

BID REQUIREMENT INFORMATION

BID CLERK
 DEPARTMENT OF ADMINISTRATION
 PURCHASING DIVISION
 2019 WASHINGTON ST E
 CHARLESTON WV 25305
 US

VENDOR

Vendor Name, Address and Telephone Number:
 The Thrasher Group, Inc.
 P.O. Box 940 / 600 White Oaks Blvd.
 Bridgeport, WV 26330
 304-624-4108

FOR INFORMATION CONTACT THE BUYER
 Guy Nisbet
 (304) 558-2596
 guy.l.nisbet@wv.gov

Signature X FEIN # 55-0633596 DATE June 14, 2016

All offers subject to all terms and conditions contained in this solicitation

ADDITIONAL INFORMATION

Addendum

Addendum No.01 issued to publish and distribute the following attached information to the vendor community.

Expression of Interest

The West Virginia Purchasing Division is soliciting Expression of Interest for The Division of Natural Resources WVDNR, from qualified firms to provide architectural/engineering services to provide necessary engineering and other related professional services to design and provide construction contract administration services to replace a wastewater treatment plant at Watoga State Park as defined within the attached documentation.

BIDDING TO		SHIP TO	
DIVISION OF NATURAL RESOURCES PARKS & RECREATION-PEM SECTION 324 4TH AVE SOUTH CHARLESTON WV25305 US		DIVISION OF NATURAL RESOURCES WEST VIRGINIA STATE PARKS 324 4TH AVE SOUTH CHARLESTON WV 25303-1228 US	

Line	Comm Ln Desc	Qty	Unit Issue
1	Wastewater engineering		

Comm Code	Manufacturer	Specification	Model #
81101527			

Extended Description :

A/E services for the replacement of the Riverside Campground at Watoga State Park.

ADDENDUM ACKNOWLEDGEMENT FORM
SOLICITATION NO.: CEOI 0310 DNR 1600000021

Instructions: Please acknowledge receipt of all addenda issued with this solicitation by completing this addendum acknowledgment form. Check the box next to each addendum received and sign below. Failure to acknowledge addenda may result in bid disqualification.

Acknowledgment: I hereby acknowledge receipt of the following addenda and have made the necessary revisions to my proposal, plans and/or specification, etc.

Addendum Numbers Received:

(Check the box next to each addendum received)

- | | |
|--|--|
| <input checked="" type="checkbox"/> Addendum No. 1 | <input type="checkbox"/> Addendum No. 6 |
| <input type="checkbox"/> Addendum No. 2 | <input type="checkbox"/> Addendum No. 7 |
| <input type="checkbox"/> Addendum No. 3 | <input type="checkbox"/> Addendum No. 8 |
| <input type="checkbox"/> Addendum No. 4 | <input type="checkbox"/> Addendum No. 9 |
| <input type="checkbox"/> Addendum No. 5 | <input type="checkbox"/> Addendum No. 10 |

I understand that failure to confirm the receipt of addenda may be cause for rejection of this bid. I further understand that any verbal representation made or assumed to be made during any oral discussion held between Vendor's representatives and any state personnel is not binding. Only the information issued in writing and added to the specifications by an official addendum is binding.

The Thrasher Group, Inc.

Company

Authorized Signature

June 14, 2016

Date

NOTE: This addendum acknowledgement should be submitted with the bid to expedite document processing.
 Revised 6/8/2012

June 16, 2016

Division of Natural Resources
Parks & Recreation-PEM Section
324 4th Avenue
South Charleston, WV 25305

**RE: Watoga State Park Engineering Service for Riverside Campground Wastewater Plan
DNR160000021**

Dear Members of the Selection Committee,

Thrasher understands the impact water and wastewater services have on a Park's ability to function and prosper, and that is something our team takes very seriously. A large portion of Thrasher's success can be attributed clients like the WVDNR and the state park systems. We know that the Thrasher team can provide the technical expertise and more importantly, the superior service it takes to move this project forward. We have a vested interest in these parks because we not only work here, but live here and play here.

Thrasher is the right engineering firm for your project for several reasons:

- **Resources for immediate action:** Our engineers and field personnel are readily available and will assure timely response to your needs.
- **Expertise:** The Thrasher team has done more wastewater treatment plants and improvement projects in the State of West Virginia than any other firm submitting on this EOI. From our ACEC award winning Romney Wastewater Treatment Plant to our ACEC award winning Crown Community Sewer project, our team has unparalleled technical expertise this type of project.
- **Cost effectiveness:** Thrasher has offices and staff all throughout the West Virginia which allows us to work more cost effectively for the WVDNR.

Thrasher's dedication to our clients, and the understanding that no other firm in West Virginia knows wastewater systems like we do, makes us the right fit for the projects at Watoga State Park.

Sincerely,

THE THRASHER GROUP, INC.



RANDY WATSON
Principal-in-Charge

The Thrasher Group, Inc.

Formed in 1983, Henry A. Thrasher and H. Wood Thrasher created Thrasher with a commitment to excellence and professionalism in engineering. As the leading consulting engineering firm in the state of West Virginia, Thrasher specializes in all facets of engineering from site development to public works projects.

In 2005, the company added architecture services to our ever-expanding list of capabilities. Throughout the past 5 years, Thrasher has grown from roughly 200 employees to the over 300 people we presently employ. Thrasher is growing at a rapid pace and that has allowed us to bring aboard some of the most sought after talent around.

We believe that the partnership we establish with our clients is what makes them and their projects successful. This philosophy is the foundation of our growing company.

We have learned, regardless of our size, our commitment to this philosophy leads to successful projects.



*The Thrasher philosophy is
PARTNERSHIP.*

*Thrasher was recently named #37 on the
Zweig White Hot Firms - Fastest Growing
Firms in the Country.*

Main Point of Contact:
Randy Watson - Principal
600 White Oaks Boulevard
P. O. Box 940
Bridgeport, WV 26330
Phone: 304-624-4108
Fax: 304-624-7831

Office Locations:
Beaver, WV
Bridgeport, WV
Charleston, WV
Oakland, MD
Fredericksburg, VA
Canton, OH
Canonsburg, PA

Thrasher Information:
Incorporated in 1983
www.thrashereng.com

THRASHER

The Thrasher Group, Inc.

With multi-discipline capabilities, Thrasher covers all of the professional services needed to deliver successful projects to both public and private clientele. The firms' roots were planted in civil engineering and consulting services for public utility projects. Over the years, our success has allowed us to branch out, expanding our services to meet both the needs of our clients and the growing need for more responsive and effective solutions.

By providing a full range of quality professional engineering, surveying, architectural, environmental and related field services, this partnership has positioned itself as one of the leading consulting teams in the Mid-Atlantic region.

Disciplinary Practices :

- Water Treatment and Distribution
- Wastewater Collection and Treatment
- Civil Engineering
- Architecture
- Land & Site Development
- Roadways / Bridges /Streetscapes
- Storm Water Systems
- Dams and Levees
- Land Planning and Landscape
- Parks and Recreation
- Survey
- Construction Monitoring
- Materials Testing
- Environmental Services
- Pipeline Inspection
- GIS Mapping Software Development

Areas of Service:

- Planning
- Preliminary engineering
- Funding direction & application assistance
- Regulatory permitting
- Design and construction document preparation
- Bid documentation & process oversight
- Construction administration & monitoring
- Post construction service & on-going commitment
- Cost estimating

Successful projects require more from an engineering firm than just technical design expertise. At Thrasher, our project managers and engineers focus on all aspects of "getting the job done."

Project Approach

Thrasher will conduct a kickoff meeting with Division of Natural Resources to refine the project scope and budget. During this meeting, a communication plan and schedule will be developed along with major milestones.

Thrasher would conduct site visits and review as-built information that is available. Once the as-built information is reviewed, any additional information, such as survey data, will be gathered by Thrasher. In addition, Thrasher will coordinate with the Department of Environmental Protection to determine the effluent parameters of the proposed wastewater treatment facility. Once this information is gathered and evaluated, the scope and budget of the project will be reviewed. Any necessary changes to the scope and budget will be agreed upon at this time.

With an updated and agreed upon scope and budget detail, the design will be completed. The wastewater treatment facility will be designed based on the proposed effluent parameters provided by the Department of Environmental Protection. All necessary environmental clearances and permits will be completed once the design is started. The site layout will be completed and construction sequence will be coordinated to ensure that there will be no interruption to existing utilities and operations. Reviews from the Division of Natural Resources will be completed throughout the design process as determined in the kick off meeting.

Bidding documents will be completed and the project will be advertised. Pre Bid meetings will be conducted by Thrasher and the Division of Natural Resources as required. Once the Bids are received, the project will be awarded and construction will start. Thrasher will conduct the inspection during construction if desired by the Division of Natural Resources. Once construction is completed and the new wastewater facility is operational, the project will be closed out and bonds released.

Project Management Scheduling and Budgeting

Scheduling:

Thrasher realizes the importance of establishing and maintaining project schedules. Time means money and making sure we help you spend your money wisely is our number one goal. Our team puts an extra emphasis on making sure our projects stay on schedule. One of the ways we accomplish this, is by utilizing specialized scheduling software to track every stage of a project from design and bidding, through construction completion.

We also require contractors working on our projects to regularly update their project schedules and give a detailed progress report at each job meeting. This helps to ensure all parties are informed and aware of potential delays. Keeping our owners up to speed with progress is our number one goal and ensures occupancy and owner supplied equipment are scheduled accordingly.

Budgeting:

At Thrasher we take construction estimating and budgeting very seriously. As a matter of fact it is considered the most important facet of what we do. Without accurate budgets, there is no tool to guide the design process. This is why we make cost estimating an integral part of the project from day one.

Our estimates go beyond the typical cost per foot of lump sum price. At Thrasher we do contractor grade estimates that look at every part of the project. We do detailed take-offs of materials and look at every man hour needed to complete a project. We also have a great understanding of the local market and material costs which allows us to accurately design to meet your budget.

WASTEWATER COLLECTION AND TREATMENT

Thrasher has planned, designed, and supervised the construction of municipal, industrial, and individual wastewater collection and treatment projects throughout West Virginia and its surrounding states. When designing a wastewater system, many factors including the environment, technology and cost-effectiveness come into play. Wastewater system projects require both experience and a strong understanding of regulations and requirements.

Having successfully designed and completed wastewater system projects ranging from \$100,000 to \$50 million dollars, the Thrasher team employs some of the most skilled and sought after professionals in the industry. Our approach allows us to develop unique solutions for our clients while providing a helping hand through difficult funding and regulatory hurdles.

WASTEWATER SERVICES:

- New Collection Systems and Extensions
- Rehabilitation and Replacement of Existing Systems
- Combined Sewer Overflow (CSO) Reduction
- Long-Term Control Plans
- Construction Monitoring
- Wastewater Treatment Plant Design
- Feasibility Studies
- Facility Planning
- Geographical Information Systems (GIS)
- Inflow and Infiltration (I&I) Testing and Evaluation

PIPELINE INSPECTION

Dealing with Inflow and Infiltration (I&I) can be both costly and time consuming. Thrasher provides a proficient pipeline inspection team and state of the art equipment to quickly and accurately identify the source of our client's pipeline problems.

Our team's experience in I&I sourcing allows our engineers to develop corrective strategies that are effective and budget conscious. Using our comprehensive approach to projects, Thrasher is able to perform Sanitary System Evaluation Surveys (SSES), and identify deficient pipeline systems, present pipeline conditions, and line locations. The collected data is provided to our clients and can then be used to determine the best method to rehabilitate or upgrade sanitary sewer and storm water systems.

Thrasher has equipment capabilities that are head and shoulders above the rest. We are able to inspect up to 1,000 linear feet of 4" to 30" pipe in one session. The team examines pipeline conditions including cracked and separated joints, faulty lateral connections and the location of system structures.

PIPELINE INSPECTION:

- Video Camera Inspections
- Flow Metering
- Smoke and Dye Testing
- Manual Inspections

CONSTRUCTION MANAGEMENT

Effective management of our projects ensures that both clients and contractors work in an efficient and safe manner. From pre-construction activities such as bid conferences and surveys, to inspections, job progress reviews, through final completion, our goal is work that proceeds in accordance with plans and specifications.

At Thrasher, we inspect and manage a wide variety of projects designed by our firm in addition to projects for contractors and other designers. We have certified project representatives responsible for overseeing every element of design integrity. Our methods have earned the respect of not only our clients, but contractors and project owners alike.

CONSTRUCTION INSPECTION SERVICES:

- Construction Materials
- Structural Steel and Concrete
- Paving
- Drainage
- Embankments
- Work Zone Safety and Traffic Control
- Erosion and Soil Control

QUALITY CONTROL AND ASSURANCE

METHODS:

- Regularly Scheduled Planning and Progress Meetings
- Engineering During Construction
- Daily Logs and Progress Sheets
- Cut Sheets
- Quantity Tracking



THRASHER SURVEY

SURVEY

Thrasher employs one of the largest survey departments in the Mid-Atlantic region and offers a wide range of land surveying and related services for federal, state, and private clients. We are committed to evolving our techniques and equipment to best serve our clients and their growing needs.

At Thrasher, we are able to provide both surveying and engineering services which provide a distinct advantage over survey-only companies. The combination of these two services provide our surveyors with a better understanding of what engineers and architects require to develop an appropriate design for different types of projects. Our field and survey personnel offer extensive experience, certified training, and flexibility to meet our clients' unique project schedules.

GENERAL SURVEY SERVICES:

- Large-scale Boundary Work
- Topographic Survey and Mapping
- ALTA/ACSM Survey and Mapping
- Lake and River Soundings
- Accident Reconstruction Survey and Mapping
- Drug-free Zone Mapping
- Expert Witness Testimony
- Construction Layout
- Permanent Project GPS Base Stations
- Building Control and Layout
- Road/Bridge Alignment and Staking
- Sewer/Water/Pipeline
- Site Layout
- Quality Assurance Surveying
- Volume/Quantity Surveys
- As-Built Surveys

GPS SURVEYS:

- Geodetic Control Networks
- Ground Control for Aerial Mapping
- Telecommunications
- FAA 1A and 2C Letters

ROUTE LOCATION SURVEYS:

- Transmission Lines
- Natural Gas Pipelines
- Wind Turbine
- Roadway, Railway and Rec Trails

COAL AND ENERGY SURVEYS:

- Pre and Post Mining Blast Surveys
- Water Quality Monitoring Plan
- Construction Layout
- Emergency Control Survey/Plans

Project Team



Randy Watson
Principal-in-Charge

Dan Ferrell, PE
Quality Assurance/Control

Jesse Alden, EI
Project Manager

Jeff Ekstrom, PE
Design Engineer

Tom Urquhart, PE, BCEE
Hydraulics Modeling Engineer

Fred Roman
WWTP Operator

Shane Meadows
Project Representative

Thrasher
Survey Team

Thrasher
Construction Management

Randy Watson **Principal-in-Charge**



Randy Watson has extensive experience in water and wastewater projects across the Mid-Atlantic Region. Randy joined Thrasher in 1984 and has worked in and helped develop the utility department in that time. His responsibilities include overseeing engineering design, project acquisition, project funding applications, and construction management.

Randy undertakes each project with an extreme level of knowledge and experience which is beneficial to clients. Randy specializes in wastewater systems, water treatment and water plant design and rehabilitation. Randy has been very successful in assisting clients who face funding challenges.

Education:

- Bachelor of Science, Mining Engineering Technology - Fairmont State University
- Associate of Science, Design and Drafting - Fairmont State University

Registrations/Certifications:

- American Water Works Association

Related Experience Includes:

- **Brooke County PSD Sanitary Sewer Extension** - Brooke County, West Virginia
- **City of Weston Sanitary Sewer Extension** - Lewis County, West Virginia
- **Town of Franklin Sewage Treatment Lagoon** - Pendleton County, West Virginia
- **Federal Bureau of Prisons FBOP Sanitary Sewer and Potable Water Design** - Lackawanna County, Pennsylvania
- **Pocahontas County PSD Water Line Replacement** - Pocahontas County, West Virginia
- **Town of Elizabeth Water Line Extension** - Wirt County, West Virginia
- **Town of Farmington Public Service District Sewer Plant Upgrades and Water Replacement Projects** - Marion County, West Virginia



Dan Ferrell

Quality Assurance/Control



Mr. Ferrell joined Thrasher in 2004 and serves as Principal and Project Manager on public utility projects for the firm. Dan is responsible for project conception to design and construction, with focus on client representation for funding and regulatory issues. Dan directs the work of numerous project engineers and technicians assigned to projects throughout the region. Typical tasks involved as part of Dan's work includes project management, utilities system management, project planning, funding, design, development of bid documentation, construction administration and operations.

Prior to joining the Thrasher team, Dan served as Director of Public Works and City Engineer for the City of Bridgeport, West Virginia. He was responsible for water, wastewater and storm water infrastructure for the City. This background is beneficial to client's going through the steps to get their towns utility infrastructure upgraded.

Education:

- Master of Science, Civil Engineering - Old Dominion University
- Bachelor of Science, Civil Engineering - Old Dominion University

Registrations:

- Registered Professional Engineer (PE)
 - States of West Virginia, and the Commonwealths of Pennsylvania and Virginia

Certifications/Affiliations:

- West Virginia Municipal Water Quality Association
- West Virginia Rural Water Association

Related Experience Includes:

- **City of Ripley Sewer System Evaluation and Improvements Project** - Jackson County, West Virginia
- **City of Clarksburg Long Term Control Plan and Wastewater Treatment Plant Upgrades** - Harrison County, West Virginia
- **City of Romney Wastewater Treatment Plant and Lift Station Upgrades** - Hampshire County, West Virginia
- **Malden Public Service District I&I Reduction and Wastewater Treatment Plant** - Kanawha County, West Virginia



Jesse Alden, EI Project Manager



Jesse Alden joined Thrasher in 2012 and serves as Project Manager in the Charleston office. Mr. Alden is involved in a number of various project and various disciplines for the firm, but specializes in utility engineering with a strong focus water and wastewater projects.

Mr. Alden is responsible for the all facets of design, contract specifications, preparation of permitting applications and coordination with various equipment manufacturers. Mr. Alden has proven himself to be a valuable member of the Utility Division through his hard work and dedication to his projects.

Education:

- Bachelor of Science, Civil Engineering Technology - Fairmont State University
- Associate Degree, Pharmaceutical Science - National Institute of Technology

Registrations/Certifications:

- Engineer Intern (EI) Certification, State of West Virginia
- OSHA General Industry Certification
- HAZWOPER Certification
- T & L Contractor Safety Orientation Certification—2011
- First Aid / CPR Certification

Related Experience Includes:

- **Weirton Water Board 18" Emergency Waterline** - Hancock County, West Virginia
- **Town of Masontown Wastewater Treatment Plant Upgrade** - Preston County, West Virginia
- **Berkeley County PSSD Treatment Plant Bay Upgrade** - Berkeley County, West Virginia
- **Anderson Equipment Company 600 GPD Wastewater Treatment Plant Replacement** - Kanawha County, West Virginia
- **Dominion Natrium Facility NGL Fractionation Plant and Wastewater System Upgrades** - Marshal County, West Virginia



Jeff Ekstrom, PE Design Engineer



Jeff Ekstrom, PE is a Project Manager who thrives on managing multiple tasks to meet the needs of clients. Throughout his 23 years of experience, Jeff has used his organizational, problem solving and leadership skills to manage, and lead the design of infrastructure projects ranging from \$100,000 to \$31 million in construction costs.

His area of specialty is environmental engineering with focus on the design of water and wastewater treatment plants and he is noted for being the first engineer to design treatment plants that implement new technologies in West Virginia.

Education:

- Bachelor of Science, Civil Engineering-West Virginia Institute of Technology

Registrations:

- Registered Professional Engineer (PE):
 - States of West Virginia, Ohio, Kentucky, and the Commonwealth of Virginia

Certifications/Affiliations:

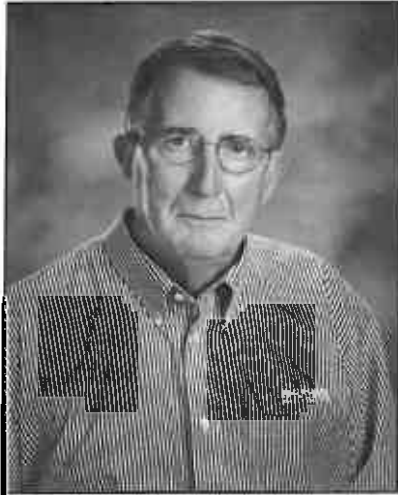
- American Water Works Association

Related Project Experience:

- **Berkeley County Public Service District Gantt's Pump Station Upgrade - Berkeley County, West Virginia**
- **Berkeley County Public Service District Inwood Wastewater Treatment Plant Bay Upgrade - Berkeley County, West Virginia**
- **Berkeley County Public Service District Baker Heights Wastewater Treatment Plant Bay Upgrade - Berkeley County, West Virginia**
- **City of Romney Wastewater Treatment Plant and Lift Station Upgrades - Hampshire County, West Virginia**
- **Corporation of Shepherdstown Wastewater Project - Jefferson County, West Virginia**



Tom Urquhart, PE, BCEE **Hydraulics Modeling Engineer**



Following 33 years as chief engineer and general manager for the Morgantown Utility Board. Tom Urquhart joined Thrasher to focus his engineering expertise in quality control and hydraulics modeling for both water and wastewater systems, utilizing the KY Pipe Modeling. Tom, a Board Certified Environmental Engineer (BCEE) and has experience in civil engineering of public utilities including design and construction of water storage tanks, new and replacement water and sanitary sewer lines, pump stations, water treatment and wastewater treatment plants. He also has extensive experience in management and operations of public utilities systems, including budgeting and rate structures.

Tom was awarded the George Fuller Award from the American Water Works Association for his management and operations of the Morgantown Utility Board. This included his recognition of his ability to budget and develop rate structures.

Education:

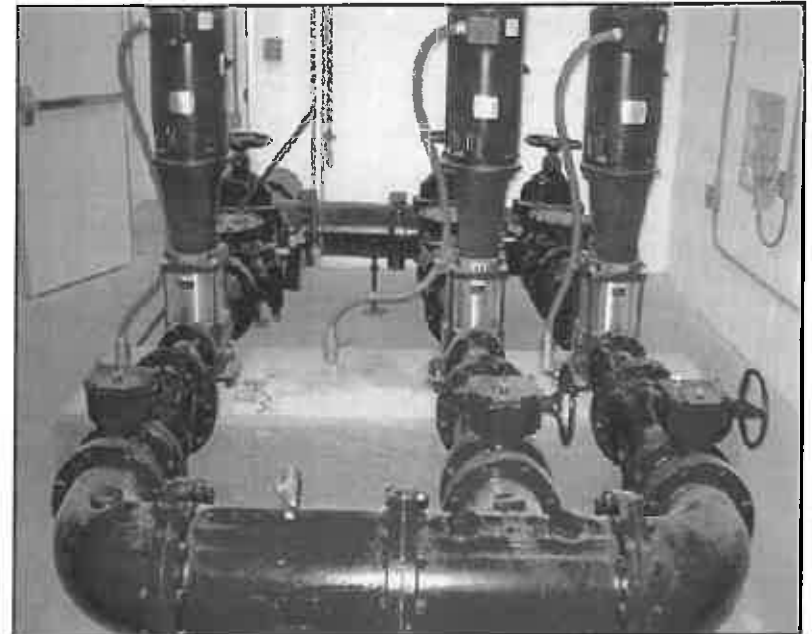
- Master of Science, Civil Engineering - West Virginia University
- Bachelor of Science, Civil Engineering - West Virginia University

Registrations/Certifications:

- Registered Professional Engineer (PE)
 - States of West Virginia, Ohio, Maryland, and Pennsylvania

Related Experience Includes:

- **Norton Harding Jimtown Public Service District Kingsville Water Line** - Randolph County, West Virginia
- **Timberline Four Seasons Resort Complete Hydraulic Modeling** - Tucker County, West Virginia
- **Pocahontas County Public Service District County-wide Hydraulic Modeling** - Pocahontas County, West Virginia
- **Mingo County Public Service District Water Line Extensions Modeling** - Mingo County, West Virginia



Fred Roman Operations Manager / Project Representative



Following nearly 15 years as Superintendent for the Sanitary Sewer Board of Fairmont, West Virginia, Fred Roman joined Thrasher bringing a high level of hands on experience in the technical operations of water, waste water and stormwater systems. Fred is a licensed Class IV Wastewater Operator, and uses his knowledge and practical experience not only during the construction process, but also in assisting clients in start-up of new facilities and troubleshooting. Fred also served as Editor in Chief of Mountain Currents Magazine, a trade magazine targeted to wastewater treatment professionals in West Virginia and surrounding states.

Education:

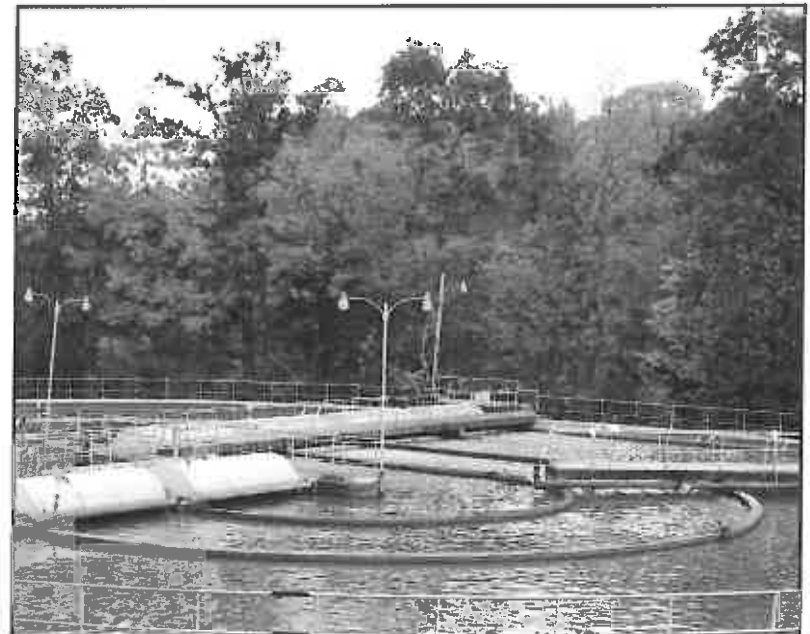
B.S. West Virginia University, Wildlife Management

Certifications:

- Licensed Class IV Wastewater Operator
- West Virginia Department of Environmental Protection Certified Lab Technician

Related Experience Includes:

- **City of Fairmont, Sanitary Sewer Board** - Before joining Thrasher, Fred was the Superintendent of the Board for almost 15 years. Fred was instrumental in implementing the City's stormwater program. Fred helped in the operation of the stormwater maintenance.
- **City of Romney, WV Wastewater Treatment Plant:** Fred has served as Construction Manager and Project Representative for the Romney wastewater treatment plant project. He is responsible for communication with engineers, clients and contractors to ensure an on-time and on-budget project. The new WWTP is a 750,000 gpd Sequential Batch Reactor facility. A belt press, sludge thickener and sludge holding tanks are included in the project.



West Virginia Division of Natural Resources State Park Experience

Watoga Water and Sanitary Sewer Improvement

Thrasher was able to provide the West Virginia Division of Natural Resources at Watoga State Park with water and sewer system improvements. The Thrasher team provided design and construction services at the park consisting of water line extension and new water treatment facilities. It was important to the Division of Natural Resources to keep the areas of construction with the least amount of disturbance as possible.

Chief Logan State Park Conference Center

The Chief Logan State Park was in need of a conference center. Thrasher, as the site development consultant, teamed with an architectural firm and was hired by the West Virginia Division of Natural Resources to provide the State Park with utility, site development and roadway design for the new conference center.

Lost River Wastewater Collection System

The West Virginia Division of Natural Resources hired Thrasher to provide services for a new wastewater collection system for the Lost River State Park. Along with the construction of the wastewater collection system, Thrasher provided erosion and sediment analysis, roadway repairs and the construction of an underground electrical system, eliminating over 49 power poles and 12,400 LF of electrical lines.



THRASHER

Greater Paw Paw Public Service District Crown Community Wastewater System

In 2008, the Monongalia County Health Department (MCHD) issued a report regarding health issues in the community of Crown brought about by the lack of appropriate wastewater collection systems for the citizens of the area. Some of the 43 residencies utilized undersized and failing individual septic systems while other residencies' sewer discharged directly into drainage areas or streams.

Comparing the waste conditions in the area to those seen in Third World countries, the MCHD turned to The Greater Paw Paw Public Service District (PSD) to assist in the improvements of this condition as the Crown community is located within the geographic area that could be served by the PSD.

Thrasher was highly involved in the preliminary assessment and planning for the project and worked with the PSD to best address the issues. This identifying various options, including the use of a package treatment system for the area. Additionally, preliminary cost estimates and possible funding options were reviewed, including the use of a "green funds" grant from the West Virginia Department of Environmental Protection's (WV DEP) State Revolving Funds.

Working with the WVDEP, utilization of an environmentally friendly package plant system with a drip irrigation field was selected and CWSRF "Green" Infrastructure Fund was utilized.



Contact:

Mr. Charlie Rosic, Councilman
Greater Paw Paw Public Service
District
PO Box 41
Rivesville, WV 26588
304-278-2078

Project Manager:

Clay Riley, PE



Lewis County EDA Roanoke School Wastewater Treatment Plant

The Lewis County Board of Education selected The Thrasher Group to design a new Wastewater Treatment Plant for Roanoke Elementary School in Lewis County, WV. The existing plant had reached the end of its useful life and was in need of replacement.

Thrasher was selected for the job in January 2016. By May 2016, Thrasher opened bids for this project and will begin construction in June 2016. Thrasher wasted no time getting to work on this project because of the project schedule set by the client. The plant must be put into service prior to school beginning in August 2016, when the staff and students return. The plant was designed and review within two short months of the selection. The project was placed out to bid and came in well under budget. Coordinating with the school board was imperative to the success of this project.

Contact:

Lewis County BOE
Melissa Riley, Personnel Director
Joseph Mace, Superintendent
239 Court Avenue
Weston, WV 26452

Project Highlights:

- Designed in 2 months
- Under Budget
- Completed project on clients schedule.

Project Manager:

Kylea DeMarco, EI



Preston County Sewer Public Service District Valley Point Sewer Collection System and 10,000 GPD WWTP

In November of 2014, The Thrasher Group wrapped up the Valley Point Sewer Collection System and 10,000 GPD WWTP Project for the Preston County Sewer PSD. The Sewer PSD had been asked to come in and take over the sewer collection for the Glade Meadows Subdivision that was previously unserved by a sewer utility. The developer of Glade Meadows had originally set up all properties to drain sewage into a pond on his land which was unsanitary.

The Sewer PSD agreed, however, the nearest existing system was approximately 5 miles away, making it not feasible to connect to the existing system. Therefore, Thrasher explored options for the construction of a collection system with an independent wastewater treatment plant in the area of Glade Meadows Subdivision.

Thrasher requested a Wasteload Allocation for the planning purposes of constructing a new wastewater treatment plant located along Glade Run to treat the sewage collected in the project area. The response from the WV DEP indicated that a wasteload allocation for discharge into Glade Run would be denied due to inadequate stream flow levels. Additionally, a wasteload allocation for a discharge into Fickey Run, a nearby stream with a larger flow, would result in strict effluent limits of 5 mg/l BOD5, 3 mg/l NH3-N, and 6 mg/l D.O. and be subject to antidegradation review.

Therefore, to meet the requirements for antidegradation review, Thrasher evaluated alternatives for this project using the construction of a gravity collection system and new, packaged, extended aeration wastewater treatment plant as the baseline case and compared other options to the baseline.

In addition to the baseline case, an option was evaluated to extend the discharge to Fickey Run, a nearby stream with a larger flow. Other options studied included the use of bio membrane treatment technology, the use of smaller on-site treatment systems, and the extension of the collection system to the existing plant that was 5 miles away.

Contact:

Mr. Martin Wotring, Chairman
Preston County Sewer PSD
15599 North Preston Highway
Bruceton Mills, WV 26525
304-379-3600

Project Manager:

Clay Riley, PE

Union Public Service District 40th Street WWTP Upgrade and Tyler Mountain Extensions

The Union PSD operates two (2) wastewater treatment plants. Thrasher performed a facility study of the 40th Street wastewater treatment plant - an extended aeration treatment plant operated in the contact stabilization mode, which was built in the 1960's and upgraded in 1991.

The 40th Street wastewater treatment plant was properly maintained, however during the investigation and study phase of the project, it was determined some of the wastewater equipment had come to the end of its useful life. It was also determined that this plant was in need of an increase in its capacity due to the commercial and residential growth in the area.

Upgrades to the 40th Street wastewater treatment plant consisted of replacing two (2) influent pumps, constructing a new screening and grit removal system, two (2) new contact stabilization tanks, four (4) new clarifiers, new sludge return pump station, a new office building, upgrading non-potable water system, demolishing existing office building, constructing new office building/garage, structural repairs to existing contact stabilization tanks, site work, piping, concrete electrical and mechanical.

Tyler Mountain Extensions

Also included in the project were gravity system extensions to the Big Tyler Mountain and Little Tyler Mountain areas, consisting of approximately 3 miles of pipeline for each extension.



Contact:

Mr. Earl Burks, Manager
Union Public Service District
5110 Washington Street, West
Cross Lanes, WV 25313
304-776-3131

Project Manager:

Jonathan Carpenter, PE

Anderson Equipment 600 GPD Wastewater Treatment Plant Replacement

This project consisted of replacing an existing extended aeration WWTP with a 1,000 GPD fixed media aeration WWTP, dosing pump station, peat filter pods and UV disinfection system.

The project also included significant permit modifications which saved our client roughly \$10,000 per year in sampling costs.



Contact:

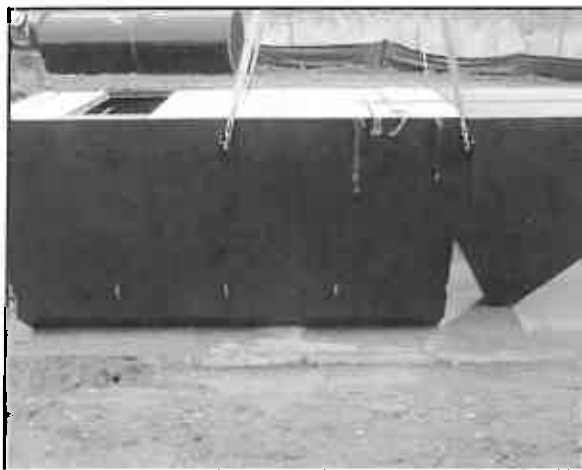
Anderson Equipment
Mr. Don Larck, Service Manager
RR 119 S Corridor G
South Charleston, WV 25303
304-756-2800
dlarck@andersonequip.com

Project Manager:

Jesse Alden, EI

Dominion Natrium Facility NGL Fractionation Plant - Wastewater System Upgrades

This project consisted of the decommission and demolition of the existing wastewater treatment, installation of a new packaged wastewater treatment plant, new duplex pump station, the procurement and installation of a prefabricated storage shed, chain link fencing, gates, piping, fittings, cleanouts, mounting hardware, and site work such as grading, gravel, and cleanup.



Contact:

Dominion Resources
Mr. Warren Green, Supervisor of
Facilities
927 White Oaks Blvd.
Bridgeport, WV 26330
304-627-3681
warren.k.green@dom.com

Project Manager:

Jesse Alden, EI

City of Romney Wastewater Treatment Plant

The Thrasher Group, Inc. assisted the City of Romney in completing a major upgrade to their 43-year old wastewater treatment plant that was failing. The City needed to add more capacity and address the environmental health issues that were affecting the aging plant. The new plant was increased from 750,00 GPD to over 1 million GPD. The additional capacity will allow the City and the County to grow economically for the future.

The project was designed to meet the requirements of the Chesapeake Bay Agreement for tertiary treatment standards, including nutrient removal. The project consisted of a complete plant upgrade, rehabilitation of three lift stations, replacement of the public works building and new laboratory/office/plant building constructed.

Thrasher was able to help the City secure all of the funding needed to complete this \$14 million project.

"A great accomplishment and exceptional collaboration..." - US Senator Shelley Moore Capito



Contact:

Mr. Dan O. Hileman, Mayor
340 East Main Street
Romney, WV 26757
304-822-5118 ext. 106

Project Manager:

Dan Ferrell, PE



Canaan Valley Public Service District Regional Wastewater Collection System

This \$10.6 million dollar project involved addressing issues with the receiving stream of the upper Blackwater River, which was listed on the impaired stream (303D) list. The USEPA, WVDEP and USGS analyzed the upper Blackwater River for total maximum daily loads (TMDL).

Thrasher was brought in to address issues discovered by those agencies. Included in the process was Thrasher's participation in a series of Public Service Commission hearings on behalf of the Tucker County Commission to assist in the formation of the new Canaan Valley PSD.

Thrasher was then hired by the newly formed Canaan Valley PSD to analyze the valley area for the development of a public sanitary sewer system. Multiple tasks were performed with this project from working with the Environmental Protection Agency and the West Virginia Department of Environmental Protection regarding the TMDL on the Blackwater River. The project solution provided a managed stream point discharge solution for the Valley.

Working with the new PSD, Thrasher designed and provided all services to bid and construct a sewer system that includes two membrane biological reactor (MBR) wastewater treatment plants and a gravity collection system. Multiple funding sources, including USEDA, USEPA, West Virginia Infrastructure Jobs and Development Council, WVDEP Green Funding through the American Recovery and Reinvestment Act (ARRA or Stimulus Dollars) as well as local funding, were used to make this effort a reality.



Contact:

Canaan Valley PSD
Mr. Bob Metzger - Chairman
P.O. Box 428
Davis, WV 26260
304 -866-3433

Project Manager:

Clay Riley, PE

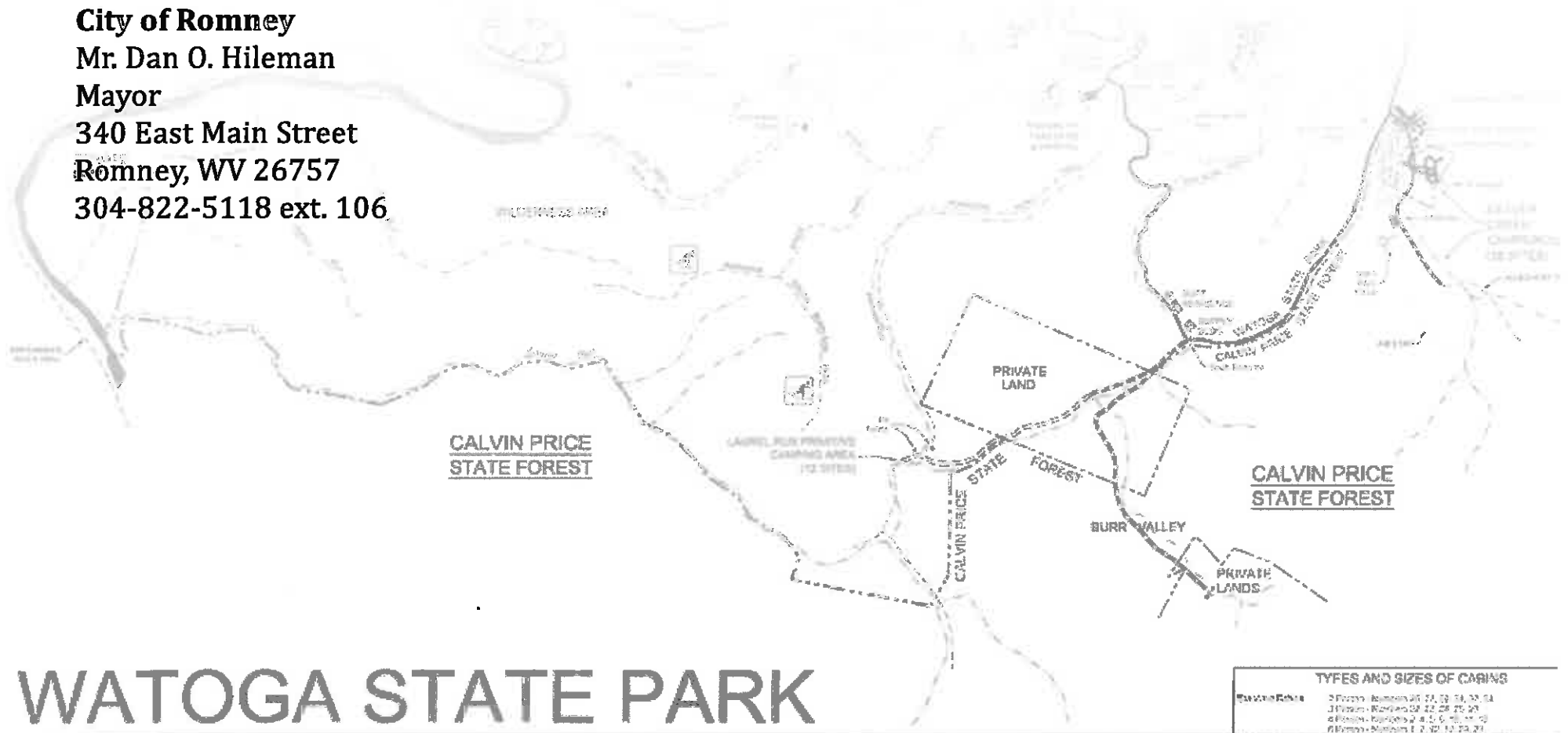
References

Malden PSD
Mr. Chet Williamson
General Manager
P.O. Box 350
Tad, WV 25201-0350
304-925-6997

City of Ripley
Ms. Carolyn Rader
Mayor
203 South Church Street
Ripley, WV 26753
304-372-3482

**Greater Paw Paw Public
Service District**
Mr. Charlie Rosic, Councilman
PO Box 41
Rivesville, WV 26588
304-278-2078

City of Romney
Mr. Dan O. Hileman
Mayor
340 East Main Street
Romney, WV 26757
304-822-5118 ext. 106



WATOGA STATE PARK

TYPES AND SIZES OF CARING	
2 Person	2 Person - Maximum 20, 22, 24, 26, 28
3 Person	3 Person - Maximum 22, 24, 26, 28, 30
4 Person	4 Person - Maximum 24, 26, 28, 30, 32
6 Person	6 Person - Maximum 28, 30, 32, 34, 36

THRASHER