



Annual Report

Public Works

OVERVIEW

The Village of Morton Grove Public Works provides essential public services, in a professional and fiscally responsible manner, to the community and general public. Thirty-eight dedicated employees are responsible for the maintenance of Village infrastructure and provide a wide variety of services to Village residents, businesses and others.

Public Works is split into five divisions:

Street Division

Engineering Division

Water/Sewer & Pumping Station Division

Vehicle Maintenance Division

Building Maintenance Division

On page three, you will find a brief description of each Division's duties and responsibilities.

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COMBINED CREW ACCOMPLISHMENTS

- LEAF COLLECTIONS
- SNOW/ICE CONTROL
- MORTON GROVE DAYS
- ARBOR DAY
- SWANCC EVENT
- NATIONAL NIGHT OUT



Mayor Di Maria and Board of Trustees:

It is my pleasure to present to you the 2018 Public Works Annual Report. As in prior years, this report will provide you with a brief description of our services as well as highlights of the year's activities.

Accepting and serving as the new Director of Public Works in the second half of 2018 has been very challenging, but a great privilege. After taking over from retired Director, Andy DeMonte, I invested many hours planning the internal staff position changes and will continue this process in 2019 to complete the Public Works staff. Andy DeMonte built and maintained one of the best Public Works Department in the area and I will strive to preserve its solid reputation and unmatched staff experience.

One of the major infrastructure projects in 2018 is the ongoing Morton Grove/Niles Water Commission Transmission Water Main Project. This project now provides water supply from the City of Evanston to both Morton Grove and Niles. Along with the water main installation, the Village of Morton Grove realized the resurfacing of 1.5 miles of Village streets. Another great accomplishment was the completion of the Meade-Moody Sewer Improvement Project, completed entirely by the Public Works Sewer Division personnel.

I am so impressed with the dedication of the men and women of Public Works; supporting each other to serve the residents of Morton Grove, twenty-four hours a day, seven days a week.

Thank you to all Public Works staff.

Respectfully Submitted,

Joseph J. Dahm

Director of Public Works

Street Division

The Street Division is responsible for the maintenance of 82.55 miles of Village, State and County roads including 11 miles of paved alleys. Additionally, the Division is responsible for the maintenance of all Village rights-of-way (parkways, sidewalks and unimproved alleys). Maintenance operations consist of: street sweeping, landscaping, street patching, signage, pavement markings, leaf collection, sidewalk/curb replacement, tree trimming, removal/replacement of trees, snow/ice control, and storm damage cleanup. This Division is also responsible for the operation and maintenance of the Village parking lots.

Engineering Division

The Engineering Division is responsible for design, inspection and administration of all construction projects for the Village. These include the following annual programs: street improvement, street patching, water main improvement, sewer lining and improvement, crack sealing, pavement markings, traffic signal and street light maintenance. This Division also is directly involved in procuring State and Federal funding while administering various projects performed within the boundaries of the Village by the State of Illinois Department of Transportation. Additional duties include performing engineering studies related to the Village streets such as: sewers/water main infrastructure, reviewing plans and proposals for projects proposed by private developers for compliance with policies and regulations of the Village and other regulatory agencies. Performing work site inspection to verify code compliance and providing developers with pertinent information regarding the diverse physical features of the Village. Advancing and maintaining the Village's Geographic Information System (GIS). Engineering also provides critical support for the Traffic Safety Commission as primary Village Staff liaison including, meeting coordination and providing technical review of Traffic and Parking Impact studies.

Water/Sewer Division

The Water/Sewer Division is responsible for the operation and maintenance of the Village owned water/sewer systems. The water system consists of two Pumping Stations with a combined storage capacity of 8.55 million gallons. Both Stations pump approximately 2.9 million gallons of water a day into 98 miles of water main which, in turn, supplies water to residents and 1,050 fire hydrants. Maintenance operations consist of: water main repairs, leak location, meter installation, inspections, J.U.L.I.E utility locates, maintenance and repair of all Pumping Station apparatus, hydrant maintenance, and water sampling.

The sewer system consists of 40.6 miles of sanitary sewer, 21.13 miles of combined sewer and 44.8 miles of storm sewer. Some maintenance operations consist of catch basin cleaning, sewer rodding, cleaning, sewer repairs, and basin installation/repair.

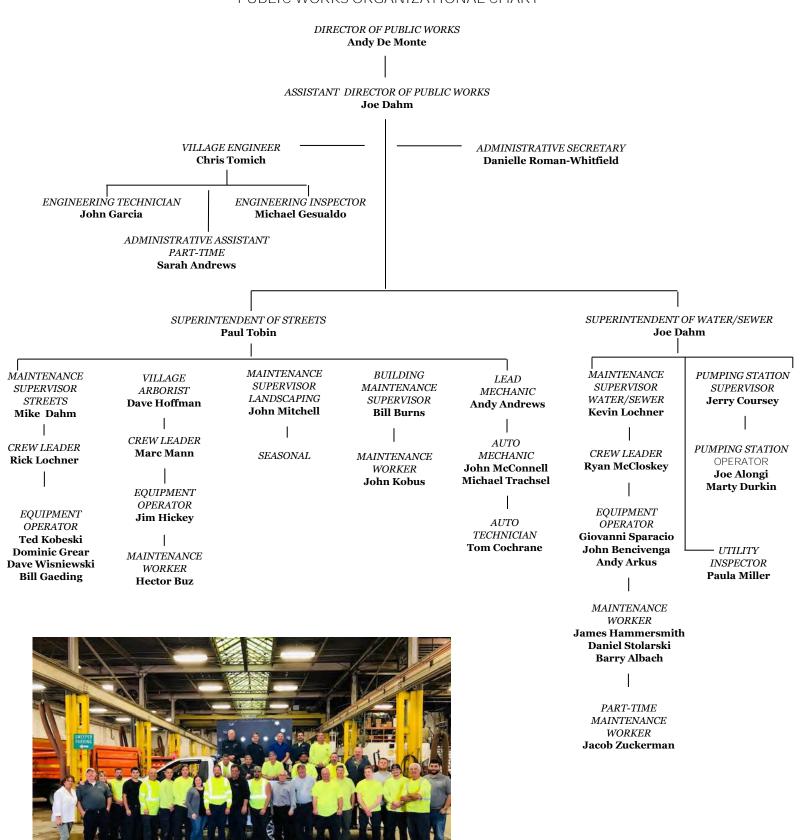
Vehicle Maintenance Division

The Vehicle Maintenance Division is responsible for the scheduling and performance of routine maintenance and all repairs to the municipal fleet. The fleet includes Fire Department, Police Department, Public Works, and the Administrative Department vehicles. This consists of approximately 130 vehicles. This Division ensures that all Village vehicles and equipment are available, reliable and safe to operate on our Village roads.

Building Maintenance Division

The Building Maintenance Division is to monitor, maintain and verify the condition of municipal buildings and properties on a continual basis. This Division participates in setting design specifications, bidding and overseeing the preventive maintenance programs which decrease the overall cost of maintaining buildings and properties. They also respond to emergency maintenance calls particularly where conditions can threaten health or safety. This includes unscheduled service calls in order to prevent injury, loss of property or to return a specific asset to service.

2018 VILLAGE OF MORTON GROVE PUBLIC WORKS ORGANIZATIONAL CHART



STREET DIVISION

Mission Statement

The Morton Grove Public Works Street Division's mission is to maintain the Village owned property that includes 270 lane-miles of thoroughfare and approximately 60 lane-miles of State and County roadways, and to maintain and preserve the public rights-of-way that encompass those areas. The Street Division prides itself by operating within budget parameters while maintaining a high level of customer service to Village residents.

The Street Division is comprised of three separate Divisions:

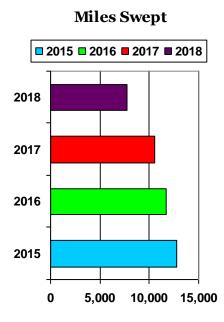
- Signs/Street Sweeping/Combined Operations
- Forestry
- Landscaping

This Division is responsible for the cleaning, repair and maintenance of our streets and alleyways. Other responsibilities include the General Pavement Maintenance Program, Alley Improvement Program and year round temporary cold-mix and hot-mix asphalt patching. This allows the Village the capability to mitigate risk on the roadways while extending the life of those road surfaces by providing the flexibility to quickly service road hazards and repair utilities. We effectively maintain the safety of the Village's roadways and alley systems by street sweeping and maintaining crucial pavement markings on streets, curbs, and parking lots.

Street Sweeping Operations

Street sweeping is necessary to not only keep streets clean, but also to prevent dirt and debris from entering the Village's combined sewer system. The less debris on the street, the better stormwater will drain during rain events. The Public Works operates two street sweepers during leaf season and one sweeper over the summer months.

Combined sweeping during the two seasons includes 7,711 miles swept and 71,930 gallons of water used.





STREET DIVISION

Sign Operations

The Sign Division is responsible for sign development and includes; surveying, repairs, installation, and maintenance of all Village signs.

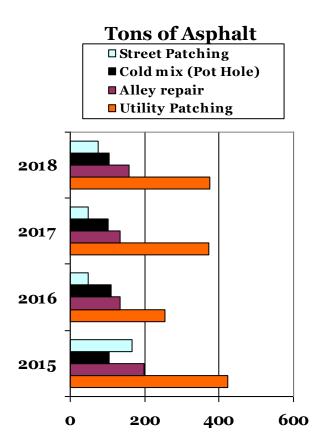
- ◆ 476 Signs were repaired and/or replaced.
- 122 Poles were repaired and/or replaced.
- ◆ 58 J.U.L.I.E. tickets located.

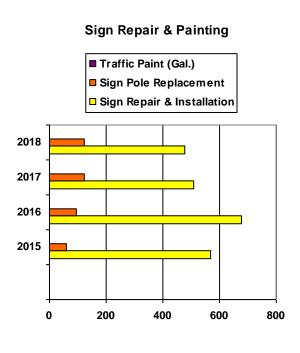
Street Operations

The Street Division is responsible for the maintenance of our asphalt streets, alleyways and street sweeping. There are six full-time employees and one seasonal worker. Furthermore, this division is involved with the annual combined crew programs such as: leaf collection, de-icing and snow removal.

Street Repairs 14 Locations 74 Tons of hot mix asphalt used
 Utility Repairs 109 Locations 374 Tons of hot mix asphalt used
 Alley Repairs 13 Locations 159 Tons of hot mix asphalt used 38 Cubic Yards of stone used
 Stone Alley Graded 1 Location 17 Cubic Yards
 Saw Cuts for Street/Alley 95 Locations

◆ Cold Mix Patching (potholes/water leaks) 104 Tons of cold-mix asphalt used





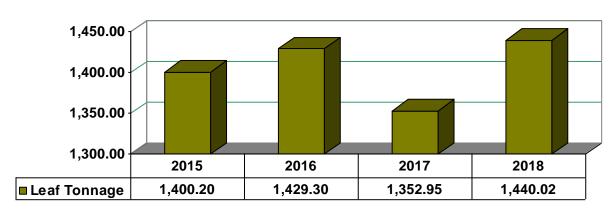
COMBINED CREW PROGRAMS

Leaf Collection Program

The Leaf Collection Program, when in full force requires the recruitment of the entire Street Division. During the 2018 leaf season 1,440.02 tons of leaves were hauled to and from the Public Works yard. The season began on October 15th and ended on December 14th.

Any remaining leaves are picked up in the middle of March when yard waste pickup resumes.

Leaf Collection Tonnage







COMBINED CREW PROGRAMS

Snow Removal Program

One of the primary objectives of the Public Works Snow Removal Program is to provide safe and orderly movement of traffic throughout the Village of Morton Grove during snow events. Depending on the severity of the storm, residents are provided with quick and efficient removal of snow from all streets and alleys. This provides a safe passage for residents, pedestrians and drivers. This program also includes snow removal from business areas such as: Dempster Street, Waukegan Road and Lincoln Avenue. Furthermore, it includes parking areas such as: Metra Station (including the off-street parking along Lehigh), 8550 Lehigh, 6240 Lincoln, and 5714/5828/6055 Dempster.

Through an agreement with Menards, snow is stored in the off-lot, located west of Lehigh, just south of Oakton.

Snow Plowing and De-icing

Snow and ice control operations begin when hazardous road surfaces are expected. Depending on conditions, a pre-application of salt brine and road salt is applied to the pavement. Plowing begins after snow accumulates to 1" or more.

Snow Plowing:

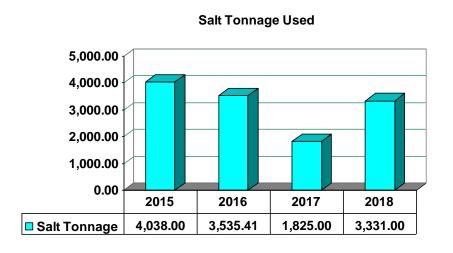
Snow plowing requires the cooperation of all Public Works staff; 2018 presented only 35 snow/ice events for the entire year.

De-icing:

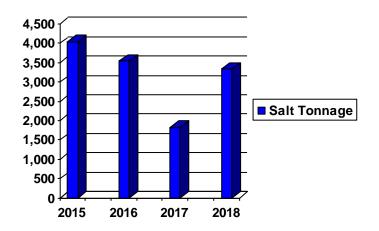
De-icing requires nine Street Division personnel to fully operate the Village's salt truck fleet which remains on a 24 hour on-call status through the entire season.

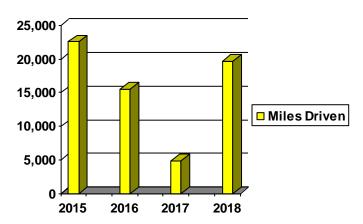
- 3,331 Tons of Salt used.
- 7,789 Gallons of Calcium Chloride used.
- 4,788.8 Gallons of Diesel Fuel used.
- 1,032.1 Gallons of Gasoline used.
- ◆ 1,415 Gallons of Brine used.

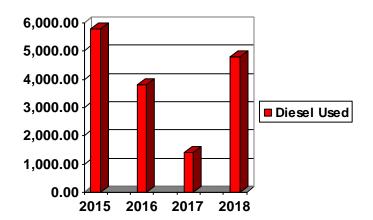
Total Vehicle miles driven was 19,679. Total employee hours worked of regular time was 1,253.5 hours, and total employee hours worked of over-time was 1,841.5 hours.

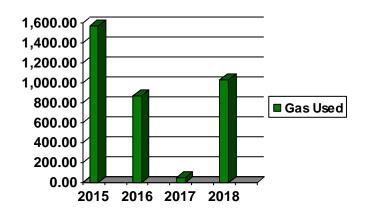


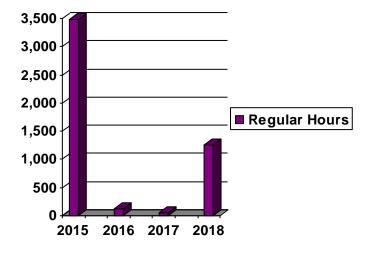
WINTER SEASON COMPARABLES 2015—2018

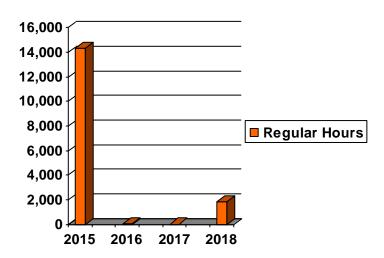












SNOW REMOVAL/DE-ICER PROGRAM



















FORESTRY DIVISION

This Division is responsible for all trees on public property; planting, trimming, general care and maintenance. The complete removal of dead or diseased trees, stump grinding and parkway restoration is also the responsibility of the Forestry Division. Other Forestry responsibilities include flag and banner/decoration installation, street light maintenance, branch pick-up, parkway repairs/restorations and participation in annual combined crew programs such as: leaf collection, de-icing and snow removal.

The Village has a Certified Arborist who provides assistance to residents and participates in public education. The Arborist annually visits public schools to educate children, at the third grade level, about the benefits of trees for us and our environment. The Village Arborist promotes Arbor Day activities while demonstrating proper tree planting techniques. Distributing trees, which started from seedlings and helps to qualify the Village as a Tree City USA community. Morton Grove has been a member of this community for 18 years now.

Tree Removal

Total trees removed 239

Total linear feet of canopy removed 2,446'

Tree Pruning

Total of trees pruned 1881

Pruned by village staff 1314

Pruned by contractor 567

Tree Planting

Total of trees planted 67

Tree City USA

Completed application

Arbor Day:

- 1. Coordinate with ComEd and schools.
- 2. Visited five schools to discuss Arbor Day, the benefits of trees, and distribute seedlings to students.

Stump Removal

Total stumps grounded out 205

<u>Parkway Repair</u>

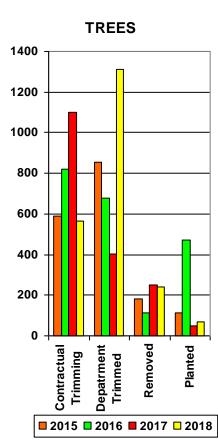
Total parkways repaired 245 Miscellaneous 40

Total grass seed used 1000 pounds

Total yards of topsoil 400 yards

Residential alleys cleared of overgrowth 200 locations





FORESTRY DIVISION

Holiday Decorations

Install and maintain holiday decorations for the following:

Lincoln Ave.

Ferris Ave.

Dempster St.

Waukegan Rd.

Civic Center

Metra Station

Village Commuter Lot

Barricades

Deliver and pick up barricades for the following:

Memorial Day Parade

Veteran's Day Parade

Assist with 4th of July Parade

Park District 5k Run

Block parties

Street Light Repairs

Repaired 10 street lights

Leaf Collection

Coordinate with Street Division during the 8 week residential Leaf Collection Program

Snow Removal

Assist with snow removal operations and de-icing control

Contract Pruning and Planting

Coordinate with Engineering Division to complete contract specifications and oversee tree trimming operations completed by outside companies.

<u>American Flags</u>

Maintain American Flags for events such as:

Memorial Day

Veteran's Day

4th of July

Banners

Maintain Dempster St. business purchased banners

Wood Chips

Delivered to residents 208 yards

Hauled to recycling center 1.200 yards

Resident Calls

Received and returned 623 resident calls



LANDSCAPING DIVISION

This Division is responsible for landscape design, planning and maintenance of Village owned properties and buildings. Other responsibilities include, spring, fall, alleys, and roadside cleanups. Village parking lot maintenance, maintenance and replacement of Village gate-way signs/plantings. When developing design ideas for landscapes, the division ensures they are cost effective, require minimum maintenance, and can cope with the challenges of the ever-changing climate and soil conditions. Day-to-day care of lawns, trees and shrubs takes place as well as providing and managing irrigation solutions, weed control and fertilizer application.

The Landscaping Division has one year round Supervisor and utilizes seasonal workers during the spring/summer months. Tasks include assisting in Village properties such as: Village Hall, Civic Center, Metra Station, Public Works, and other Village owned properties which are mowed once a week. Flowers are planted, then watered and weeded on a weekly basis. All other properties are mowed and weeded as needed. This division also picks up garbage and debris within Dempster and Waukegan business districts, as well as many other locations.

Public Building Cuts

Grass cutting, sidewalk edging, garbage pick-up, planting flowers/bushes and trimming trees/bushes— 11 locations

Cul-de-sac Cuts

Grass cutting and trimming bushes—14 locations

Alleys Cuts

Trimming bushes and garbage pick-up—44 locations

Right-of-way Cuts

Grass cutting, line trim and garbage pick-up—34 locations

Village cuts

Grass cutting, edging, line trim, trimming tress/bushes, and garbage pick-up-606 Village cuts for the year

Annual Planting Beds

Maintain and water 91 planters

Village Sign Maintenance

Maintain and repair Village signs or post. Installed Fire Station #5 sign.

Adopt a Pot Program

91 flower kits were adopted for locations at: Dempster St., Lincoln Ave.,

Civic Center, Village Hall, and Metra Station.

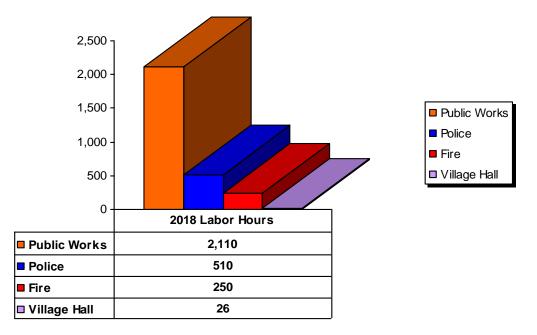


VEHICLE MAINTENANCE DIVISION

The Vehicle Maintenance Division is responsible for the scheduling and performance of routine maintenance and all repairs to the municipal fleet. The fleet includes Fire Department, Police Department, Public Works, and the Administrative Department vehicles. This consists of approximately 130 vehicles. The Division ensures that all Village vehicles and equipment are available, reliable and safe to operate in the most cost efficient manner. Inventory of parts and all record keeping is obtained and kept on file by the vehicle maintenance supervisor. Records kept include data regarding the fuel control system. This warrants and ensures compliance with federally mandated fuel and tank regulations.

	2018 Diesel & Gas Usage Village Fleet											
Month	Public Wo	orks/Street	Public Wo	rks/Water	Police Department	Fire Dep	partment	Village Hall	Park D	District	School Dist. 70	
	DIESEL:	GAS:	DIESEL:	GAS:	GAS:	DIESEL:	GAS:	GAS:	DIESEL:	GAS:	GAS:	
JAN	1,408.10	1,071.20	854	535.6	2,713.80	926.1	140.8	83.7	8.3	314.3	24.9	
FEB	2,535.20	1,153.20	1,267.50	576.6	2,549	812.8	189.6	60.1	50.4	392.1	46.9	
MAR	935.1	911.5	467.5	455.7	2,926.50	711.3	183.8	72.4	6.7	347.1	0	
APR	1,108.60	863	554.3	431.6	2,668.90	736.9	198.8	74.2	7.94	307.4	14.7	
MAY	1,100.80	872.2	550.3	438.6	2,701.60	825.6	259.6	83	184.7	554.5	52.7	
JUN	1,191.20	1,069.80	595.6	534.9	2,699.10	830.7	210.2	59.2	183.7	614.9	59.2	
JUL	1,091.80	1,121.90	546.3	576.1	2,806.70	829.2	250.5	78.7	102.8	656.1	37.3	
AUG	1,223.80	987.4	611.9	493.7	2,846.20	765.6	222.6	86.4	159.7	630.1	0	
SEPT	754.7	887.8	371.7	437.2	2,591.00	798.1	158.7	52	147.9	494.9	24.6	
OCT	1,491.40	937.3	768.3	482.9	2,448.70	823.7	150.6	81.8	79.2	569.8	0	
NOV	2,002.50	887.8	1,031.50	457.3	2,310.40	660.5	150	61.1	0	287.3	24.8	
DEC	1,345.59	857.4	422.2	422.2	2,465.40	739.9	106.8	37.8	59	213.3	0	
TOTALS:	16,188.79	11,620.50	8041.1	5842.4	31,727.30	9,460.40	2,222.00	830.40	990.34	5,381.80	285.10	

VEHICLES REPAIRED BY DEPARTMENT



STREET DIVISION VEHICLES & EQUIPMENT

UNIT #	MODEL YEAR	MAKE	MODEL	HOURS / MILES	DESCRIPTION	AGE
0101	2001	Dodge	3500	96,301	Small Dump	17
1202	2012	Ford	F250	41,214	Pick Up	6
1603	2016	Ford	Explorer	13,471	SUV	2
0104	2001	Ingersol Rand	DD16	330/hrs.	Roller	17
1206	2012	Ford	F350	32,777	Small Dump	6
0307	2003	Ford	F350	77,472	Small Dump	15
1408	2014	International	Work Star	19,601	Chipper Truck	4
1610	2016	Freightliner	SD108	7,706	Dump/Salter	2
1511	2015	International	4600	18,856	Dump/Salter	3
1812	2018	Freightliner	108SD	4,591	Dump/Salter	0
1313	2013	Ford	F450	23,320	41' Aerial	5
1214	2012	Mack	CXU613	187,466	Semi Tractor	6
9914T	1999	Hilbuilt	Mongoose	N/A	Semi Trailer	19
1815	2018	Freightliner	108SD	3,797	Dump/Salter	0
9617	1996	John Deere	544G	11,084	End Loader	22
1718	2017	John Deere	544K	1,277/hrs.	End Loader	1
1419	2014	John Deere	544K	14,635	End Loader	4
1421	2014	Ford	3500	37,155	Utility	4
0022	2000	International	4700	28,095	55' Aerial	18
8825	1988	Ford	L8000	107,233	7,233 Dump/Salter	
9126	1991	GMC	Top Kick	50,557	Flatbed	27
9627	1996	Bomag	5 ton	701/hrs.	Roller	22
9930	1999	Vermeer	1024	239/hrs.	Stump Grinder	19
1732	2017	Freightliner	108 SD	10,429	10yd Dump	1
9836	1998	Ford	LN8000	81,091	Dump/Salter	20
1337	2013	Ford	F250	40,025	Pick up	4
1038	2009	Bobcat	S220	998/hrs.	Skid Steer	9
0938T	2009	Sure Trac	20'	N/A	Trailer	9
0742	2007	JLG	Lo16	N/A	Roller Trailer	11
9543	1995	Mobark	17	1,147	Chipper	23
9844	1998	Target	26	N/A	Saw	20
0347	2003	Ford	F250	126,121	Pick up	15
7848	1978	Vermeer	N/A	N/A	Log Splitter	40
1351	2013	John Deere	1435	635/hrs.	Mower	5
0951T	2009	United Cargo	N/A	N/A	Trailer	9
0052	2000	Sterling	LT 7500	91,893	14yd Dump/Salter	18

STREET DIVISION VEHICLES & EQUIPMENT

UNIT #	MODEL YEAR	MAKE	MODEL	HOURS / MILES	DESCRIPTION	AGE
1723	2017	Freightliner	108 SD	8,680	15 yd Dump	1
9554	1995	Ingersolrand	835	441/hrs.	Compressor	23
0156	2001	Ford	F350	115,885	Small Dump	17
1157	2011	Mobark	1800	3,668/hrs.	Chipper	7
1459	2014	Ford	F450	3,201	Tow Truck	4
9163	1991	HiVue	N/A	N/A	Arrow Board	27
9264	1992	Target	24	N/A	24" Saw	26
0665	2006	International	N/A	326,125	Semi Tractor	11
9665T	1996	Hilbuilt	Mongoose	N/A	Semi Trailer	21
1150	2011	Ford	Crown Vic	55,265	Pool Car	7
0987	2009	Ford	Fusion	25,576	N/A	9
0766	2007	Bobcat	463	584	Skid Steer	11
1768	2017	Bobcat	S630	126	Skid Steer	1
0969	2009	International	7400	30,688	Dump/Salter	9
1471	2014	Ford	Fusion Hybrid	4,137	Pool Car	4
0872	2008	John Deere	544J	7,010/hrs.	End Loader	10
1673	2016	Ford	F-250	26,336	Pick Up	2
1574	2015	Lee Boy	1000B	684	Paver	3
0076	2000	Big Tex	TX15	N/A	Paver Trailer	18
0777	2007	Ford	F150	36,776	Pick up	11
0178	2001	Ford	F350	80,339	Pick up Utility	17
1683	2016	Ford	F350	10,739	Small Dump	2
1084	2010	Ford	Fusion	27,892	Pool Car	8
0785	2007	Wanco	N/A	N/A	Arrow Board	11
0386	2003	Toyota	4000	5,406	Forklift	15
0955	2009	Scagg	Tiger Mower	645/hrs.	Mower	9
08S2	2008	Elgin	Pelican	54,328	Sweeper	10
09S1	2009	Elgin	Pelican	53,695	Sweeper	9
1875	2018	Ford	Expedition	11,453	SUV	0
1931	2019	Freightliner	108SD	1,292	Dump/Salter	0
1849	2018	Hamm	HD 10c VV	2/hrs.	Roller	0

WATER/SEWER DIVISION VEHICLES & EQUIPMENT

UNIT #	MODEL YEAR	MAKE	MODEL	HOURS / MILES	DESCRIPTION	AGE
1605	2016	Ford	F350	29,773	Pick up Utility	2
1309	2013	Ford	F550	26,614	Step Van	5
9316	1993	Peterbuilt	35 7	38,703	Vactor	25
1620	2016	Ford	F250	25,467	Pick up	2
0053	2000	Sterling	LT 7500	72,265	14yd Dump	18
1424	2014	International	Work Star	20,545	10yd Dump	4
1228	2013	Caterpillar	420FIT	3,444/hrs.	Backhoe	5
1529	2015	Caterpillar	M316	585/hrs.	Excavator	3
1533	2015	Ford	K2500	21,290	Pick up Utility	3
0134	2001	Dodge	Ram 2500	45,733	Van	17
9835	1998	Sterling	LT8000	78,749	12yd Dump	20
1645	2016	Ford	F250	7,692	Pick Up	2
1740	2017	Ford	F250	5,272	Pick up	1
1046	2010	Ford	Fusion	31,511	Car	8
0861	2008	Ford	F450	35,564	Flatbed	10
1362	2013	Wanco	N/A	N/A	Arrow Board	5
9367	1993	Ditch Witch	N/A	107/hrs.	Trencher	25
1139	2011	Ford	F250	70,894	Pick up	7
0180	2001	Caterpillar	420D	5,992	Backhoe	17
0681	2006	International	4900	24,163	Vactor	12
0782	2007	Ford	Explorer 37,299 Eng.		Eng. Inspector	11
0189	2001	Ford	F250	102,420	PW Pool Car	17

FIRE DEPARTMENT VEHICLES

UNIT #	MODEL YEAR	MAKE	MODEL	HOURS / MILES	DESCRIPTION	AGE
A4	2011	International	4300	69,305	Ambulance	7
A4R	2007	International	4700	99,892	Ambulance	11
A5	2017	Freightliner	FL80	38,315	Ambulance	1
Q4	2006	Smeal	Smeal N/A 91,732 Quint Pumper		Quint Pumper	12
E5	2015	Smeal	N/A 33,829 Pumper		Pumper	3
E4R	1999	Pierce	Sabre 126,988		Pumper	17
S4	1993	Pierce	Arrow	18,321	Squad truck	25
400	2014	Ford	Interceptor	103,754	Chief's Car	4
402	2008	Chevrolet	1500	45,299	Command Van	10
404	2015	Ford	Expedition	6,173	Fire Prevention	3
406	2010	Ford	Crown Vic	28,117	Pool Car	8
408	2012	Dodge	Charger	117,420	Pool Car	6

POLICE DEPARTMENT VEHICLES

UNIT #	MODEL YEAR	MAKE	MODEL	HOURS / MILES	DESCRIPTION	AGE	
Squad 801	2017	Ford	Interceptor	10,609	Command Vehicle	1	
Squad 802	2017	Dodge	Charger	2,173	Patrol	1	
Squad 803	2015	Ford	Interceptor	69,937	Patrol	3	
Squad 804	2015	Ford	Interceptor	79,458	Patrol	3	
Squad 805	2016	Ford	Interceptor	48,934	Patrol	2	
Squad 806	2015	Dodge	Charger	71,803	Patrol	3	
Squad 807	2015	Dodge	Charger	77,608	Patrol	3	
Squad 808	2017	Ford	Interceptor	18,866	Patrol	1	
Squad 809	2015	Dodge	Charger	67,414	Patrol	3	
Squad 810	2016	Dodge	Charger	64,658	Patrol	2	
Squad 811	2017	Ford	Interceptor	37,185	Patrol	1	
Squad 812	2016	Dodge	Charger	58,177	Community Liaison	2	
Squad 820	2012	Dodge	Charger	75,911	Investigations	6	
Squad 821	2013	Dodge	Charger	70,192	Special Operations	5	
Squad 822	2013	Dodge	Charger	68,800	Investigations	5	
Squad 823	2013	Dodge	Charger	71,184	Investigations	5	
Squad 824	2015	Dodge	Charger	21,274	Deputy Chief	3	
Squad 825	2016	Ford	Interceptor	17,681	Deputy Chief	2	
Squad 826	2015	Ford	Explorer	40,799	Chief	3	
Squad 830	2008	Ford	F150 Pick Up	44,426	Animal Control	10	
Squad 831	2010	Ford	Crown Vic	69,586	C.S.O.	8	
Squad 832	2011	Ford	Crown Vic	61,874	C.S.O.	7	
Squad 833	2013	Dodge	Charger	91,732	C.S.O.	5	
Squad 834	2012	Dodge	Charger	59,888	C.S.O.	6	
Squad 835	2010	Ford	Crown Vic	69,815	C.S.O	8	
Squad 840	2006	Nissan	Armada	47,961	Special Operations	12	
Squad 841	1999	Ford	E250 Van	76,000	Special Operations	19	
Squad 842	2005	Ford	F-150	173,709	Special Operations	13	
Squad 844	2016	Ford	Escape	30,938	Special Operations	2	

VEHICLE'S SOLD AT THE AMERICA'S AUTO AUCTION



1995 Chevy Suburban—sold for \$1,500



2010 Ford Crown Vic-sold for \$1,100



2010 Ford Crown Vic-sold for \$1,000

NEW VEHICLE'S PURCHASE IN 2018



2018 Ford Expedition



2018 Hamm Roller

ENGINEERING DIVISION

The Engineering Division is responsible for design, inspection and administration of construction projects involving private and public infrastructure improvements. The management of the Village's GIS (geographical information system) is another responsibility of the Engineering Division. The Engineering Division strives to proactively evaluate the Village's infrastructure systems and identify long-term maintenance needs as well as to develop annual programs and projects to maintain or expand infrastructure systems. Most of these programs and projects are developed and administered by the Engineering Division. Construction standards controlling construction of improvements in the rights-of-way or on village property are established, followed and revised by the Engineering Division.

The Engineering Division is directly involved in procuring funding and/or administering contracts for projects performed within the Village using State or Federal money. To complete its work, Engineering Division staff regularly coordinates with residents, businesses, developers, utility companies, elected officials, county, state and federal regulators, and staff members from other municipalities.

Water Supply Line Project

Engineering staff was part of the Operations Team for the cooperative project between the Village of Morton Grove and the Village of Niles to design and construct a new water supply from the City of Evanston. Morton Grove-Niles Water Commission was established in 2016 to supply water to the Villages of Morton Grove and Niles. Construction began and was substantially completed with an operational, nine-mile water supply line in 2018. The water supply pipeline was constructed and over 75 percent of the disturbed streets were restored.

The construction engineering team of 10 consultants was led by Stanley Consultants, Inc. to oversee 11 contracts and one material supply contract. Underground construction includes many opportunities for unforeseen conflicts and conditions. The design engineering team remained intact to handle design and permitting issues that arose during construction.

The pipeline construction disturbed approximately three miles of streets in Morton Grove and roughly six miles more in Skokie and Niles. The Morton Grove-Niles Water Commission paid to restore the street pavement. The pipeline route selected during design took into account the poor condition of the pavement, so an added benefit of the work was to rehabilitate street pavement in need of restoration. Three on-street parking areas were added as part of the improvements at the intersection of Marmora Avenue and Dempster Street. Curb ramps at crosswalks along the route were upgraded to meet state and federal standards.

Construction Engineering Team

Stanley Consultants
Applied Technologies, Inc.
Ciorba Group, Inc.
Knight E/A, Inc.
Material Services Laboratory
Morreale Communications
Robinson Engineering
Strand Associates
Tecma Associates, Inc.
Thomas Engineering Group, LLC

Construction Contracts

Contract 1—Berger Excavating Contractors
Contract 2—DiMeo Brothers, Inc.
Contract 3—Bolder Contractors, Inc.
Contract 4—Michels Pipe Services
Contract 5— Material Supply Contract
Contract 6—Joseph J Henderson & Son, Inc.
Contract 7—Joseph J Henderson & Son, Inc.
Contract 8—DN Tanks, Inc.
Contract 9—IHC Construction
Contract 10—Bolder Contractors, Inc.
Contract 11—Albright
Contract 12—Gaskill and Walton Construction Co.

<u> Street Patching Program</u>

The 2018 Street Patching Program included approximately 30 different street segments throughout the Village. Chicagoland Paving Contractors, Inc. was hired to remove and replace 3166 square yards of the top 1.5 inches of asphalt pavement. The total cost of the project was \$50,391.

ENGINEERING DIVISION

CONCRETE REPLACEMENT PROGRAM

The purpose of this program is to repair the concrete features to a serviceable condition and to improve sidewalks and curb ramps to meet accessibility standards. This program focuses on the condition of concrete sidewalks, curb/gutter, pavement, and driveways that naturally deteriorate over time and can be damaged by snow plowing operations, public utility repairs, tree root growth, and excessive loading.

Totals for 2018 Concrete Replacement Program <u>Sidewalk Repairs</u>

119 Locations 12,069 square feet

Curb Repairs:

76 Locations 1,631 lineal feet

Driveway Apron Repairs (required due to utility repairs)

24 Locations 415 square yards

Pavement Patches

5 Locations 147 square yards



BEFORE



AFTER

Oakton Street Pedestrian Facility Improvements

Morton Grove, Niles and Skokie began coordinating a project to provide a facility for pedestrians along the Oakton Street corridor between Caldwell Avenue and Gross Point Road. Niles added a segment of Caldwell Avenue to the project. Morton Grove has acted as the lead agency for the group and applied for and received engineering funding for the work. An agreement was executed with Cook County in 2018 and the engineering work will begin in 2019. There are pedestrians walking and cycling in and along Oakton Street each day of the year to access Oakton Street employment centers and bus stops. Residents of Niles and Skokie have contacted Morton Grove about providing a safer facility. Niles West High School has many students walking and cycling during the school year and summer school. This project will meet an existing and future need along a state highway. It is anticipated to be an attractive improvement allowing for county, state and federal funding. The conceptual project cost is over \$2,000,000.

Dempster Street Streetscape

The streetscape along the south side of Dempster Street, is being planned to be extended westward to the river in 2019. The design began and a permit from the Illinois Department of Transportation was applied for in 2018. The work includes replacing the sidewalk and adding street lights and street furniture matching the streetscape between Ferris Avenue and Central Avenue. The construction cost for the work is estimated to be \$300,000.

Pavement Marking Program

Pavement markings on the Village's streets are worn away by vehicle tires, snow plows and environmental conditions. The Village participated in a cooperative purchasing program to hire Precision Pavement Markings from Elgin to renew the visibility of those markings. General Funds are used for this program. The 2018 Pavement Marking Program was completed at a total cost of \$29,579.

WATER & SEWER DIVISION

The Water & Sewer Division is committed to around-the-clock service for the Village and its residents. It continues to strive to improve its preventive maintenance programs, through cost-effective measures, as well as maintain and further enhance the current level of service provided. One of the Division's priorities is to preserve and maintain major infrastructure while protecting the system's investment.

FUNCTION OF THE WATER MAINTENANCE CREW

The Water Division crew maintains and repairs approximately 98 miles of water mains, 1,050 fire hydrants and 1,050 service valves located in the Village's water distribution system. The following chart represents some of the services performed during 2018.

RECORD OF WATER REPAIRS IN 2018

Month	Water Main Breaks	Water Service Leaks	Bolt Leaks	Valves Repaired	Valves Replaced	Valves Exercised	Valves Installed	Water Main Replaced/ Installed LF	Hydrants Repaired	Hydrants Replaced/ Installed	пуцганця	Hydrants Painting
January	24	6	0	0	2	65	3	0	6	6	0	0
February	11	1	0	0	0	31	2	8	0	11	0	0
March	3	3	3	0	5	6	0	40	0	10	0	0
April	1	1	0	0	6	0	4	15	1	1	0	0
May	0	1	0	1	0	19	0	0	0	0	13	0
June	3	1	0	1	0	148	0	0	0	5	221	0
July	6	3	0	0	0	13	0	0	1	0	90	190
August	4	3	0	0	0	11	0	0	1	0	0	0
September	5	1	0	0	0	10	0	0	1	1	0	0
October	2	4	0	0	1	4	1	10	1	3	198	0
November	7	2	0	0	2	19	1	0	1	0	0	0
December	16	3	3	0	0	42	0	0	1	0	0	0
2018 Total	82	29	6	2	16	368	11	73	13	37	522	190

SEWER DIVISION

The Sewer Division is responsible for the operation and maintenance of the Village's 40.6 miles of sanitary sewer pipe, 44.8 miles of storm sewer pipe and 21.13 miles of combined sewer pipe. Crews are equipped with the latest sewer rodding, drain-cleaning and video inspection equipment to effectively and quickly identify and clear problem areas in the sewer system. The Sewer Division also replaces and rebuilds aging sanitary, storm sewer pipes, catch basin and manhole structures throughout the Village. The lining of aging sanitary sewer pipe continues each year providing a new structurally sufficient pipe while decreasing infiltration and inflow from ground water run-off into the Metropolitan Water Reclamation District interceptors.

The following chart represents some of the services performed during 2018.

RECORD OF SEWER REPAIRS IN 2018

Month	Curb Drains Cleaned EACH	Curb Drains Repaired EACH	Curb Drains Replaced EACH	Storm Sewer Pipe Installed/ Replaced LF	Storm Sewer Pipe Repaired LF	Storm Sewer Pipe Tele- vised LF	Storm Sewers Rodded LF	Sump Pump Connec- tions LF	Combina- tion Sewers Rodded LF	Sanitary Sewers Rodded LF	Sanitary Sewer Pipe Repaired LF Basin 7	Sanitary Sewer Pipe Televised LF	Sanitary Sewer Pipe Tele- vised Basin 7	Sanitary Sewer Pipe Repaired	Sanitary Sewer Pipe Installed/ Replaced LF	Sanitary Sewer Pipe Lined LF
JAN	0	0	0	0	0	0	0	0	0	1,100	0	0	0	0	0	0
FEB	0	0	0	0	0	0	0	0	0	0	1,915	0	1,915	8	0	0
MAR	0	0	0	0	0	0	0	0	0	300	0	0	0	8	0	0
APR	0	1	3	0	0	0	0	0	0	0	0	0	0	6	0	0
May	2	2	2	0	0	0	0	0	0	0	0	0	0	0	400	7,000
JUN	8	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0
JUL	7	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0
AUG	2	2	0	0	0	0	0	0	0	0	0	0	0	0	400	0
SEPT	3	3	0	0	0	0	0	1	0	0	0	0	0	0	0	0
OCT	1	1	0	0	8	0	0	0	195	1,500	675	0	0	0	39	0
NOV	0	0	0	0	0	0	0	0	0	600	0	0	600	0	0	0
DEC	0	0	0	0	0	0	0	0	0	1,018	0	1,018	0	0	0	0
2018 Totals	23	24	5	0	8	0	0	1	195	4,518	2,590	1,018	2,515	22	839	7,000

of Event 1896	Type and Location of Event Original Water System supplied by a deep well at 8525 Callie Avenue, next to the Village Hall, Fire Station and Police Department, 6250 Lincoln Avenue.
1911	First water main system was installed from Capulina Avenue to Lincoln Avenue, Old Mill Road to Georgiana Avenue. Well was located at 8525 Callie and Lincoln next to the Village Hall, Fire Station and Police Department, 6250 Lincoln Avenue.
1932	Started construction of the North Pumping Station and 500,000 gallon reservoir, 8820 National Avenue.
1934	Installed 12" Feeder Main from the North Pumping Station under the Chicago River to Main Street to feed the east side of the Village.
1936	Completion of the North Pumping Station, 8820 National Avenue with 500,000 gallon underground storage reservoir. Started receiving Lake Michigan Water from the City of Chicago.
1936	Completion of the water tank located at 8525 Callie Avenue next to the Fire Station.
1952	North Station 300,000 Gallon Water Tank was completed, 8820 National Avenue.
1952	North Station second room addition for Pump #4.
1952	North Station 2,000,000 Gallon Reservoir was completed, 8820 National Avenue.
1958	South Pumping Station and 2,000,000 Gallon Reservoir Construction, 6702 Oakton Street.
1958	12" Feeder Main installation from Harlem Avenue and Howard Street to the South Pumping Station.
1958	14" Discharge Main installation from the South Station east down Oakton Street to the South Water Tank.
1963	8" water main feed at Narragansett Avenue and Eldorado Drive to the Village of Golf.
1965	3,000,000 Gallon Reservoir was added to the existing 2,000,000 Gallon Reservoir at the South Pumping Station.
1967	Caldwell Avenue 20" Feeder installation from the South Pumping Station across the Chicago River east to Morton Grove Pharmaceutical.
1967	Lincoln Avenue 16" Feeder Main installation from the 20" main at Morton Grove Pharmaceutical to Dempster Street
1967	Dempster Street Harrer Park 12" Feeder Main installation from the 16" Feeder Main at Dempster and Lincoln Avenue to Park View School.
1967	12" Feeder Main Installation from the 16" Feeder Main at Shermer Road and Church Street, east on Church Street to National Avenue.
1967	12" Feeder Main installation from the 16" Feeder main at Shermer Road and Church Street, west on Church Street to Ozark Avenue.
1967	16" Feeder Main installation from North Pumping Station to Church Street and Shermer Road.
1973	20" Feeder main was installed from the Howard Street and Harlem Avenue feed from Chicago to the South Pumping Station.
1974	North Pumping Station Back Room addition was completed.
1982	Started Water Meter Replacement Program with new Rockwell Water Meters and Tele-Tape Remote Reading System (TTR).
	1896 1911 1932 1934 1936 1936 1936 1952 1952 1958 1958 1958 1963 1965 1967 1967 1967 1967 1967 1967

Date	e of Event	Type and Location of Event
	MY Alla	North West Water Commission (NWWC) installed a 60" Transmission Water Main through the Com Ed right-of-way. The NWC provided a future 8" emergency water connection at National Avenue and the Com Ed right-of-way, currently not connected to the Morton Grove system.
1		Completed Water Meter Replacement Program with new Rockwell Water Meters and Tele-Tape Remote Reading System.
		Installation of the Booster Pump and Vault at Washington Street and Courte Drive in Niles to supply water to North Suburban Public Utility Company (NSPUC).
	1992	Installation of new pumps and motors at the South Pumping Station, 6702 Oakton Street
		N <mark>ew 16" water main connection from</mark> Chi <mark>c</mark> ago to Morton Grove's 20" Fee <mark>der</mark> Main at Howard St <mark>reet and Harlem Avenue.</mark>
	1995	Installation of the Vacuum Priming System at the North Pumping Station.
1		Installation of the Pressure Relief Valve at the North Pumping Station on the 12" discharge main exhausting into the 2 million gallon reservoir.
1		Installation of the P <mark>ressure Relief Valve at Dav</mark> is Street on the 12" Feeder behind Park View School
V		Installation of the <mark>Pressure Relief Valve at Caldwell Avenue on th<mark>e 1</mark>2" water main coming from the North Station.</mark>
1/6	1995	Upgrading of the South Station Chlorine System.
801	1995	Upgrading the South Station Backup Generator Diesel Fuel Tank.
N		Installation of the North Station Wall Exhaust Fan and Vent Louver System in the Middle Room.
1		Removal of the North Station 500,000 gallon legged water tank and replaced with a 750,000 gallon Spheroid water tank.
	13131	Removal of the South Water Legged Water Tank and replaced with a 300,000 gallon Spheroid water tank.
	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Installed new 12" water main on Beckwith Road east from Washington Street to Ozark Avenue.
		Installed new 12" water main on Beckwith R <mark>oad e</mark> ast from Waukegan Road to Narragansett Avenue.
2	111	Installed new 12" water main on Waukegan Road from Dempster Street North to Beckwith Road.
		12" Water Main extension installation from Beckwith Road on Ozark Avenue south to Church Street.
Market .		12" Water Main extension installation from just north of Lincoln Avenue on Frontage
		Road and the Edens Expressway south to Central Avenue and Main Street.
2	2008	Installation of the North Station 500 kW Generator and Transfer Switch.
2	2009	Replaced four (4) 12" Gate Valves on Oakton Street on the 12" Feeder Main going to the
		South Station. Location #1 - Neva Avenue and Oakton Street #2 - Waukegan Road and
		Oakton Street #3 - New England Avenue and Oakton Street #4 - South Pumping Station
		Driveway and Oakton Street.

Date	of Event	Type and Location of Event
	2010	Dempster Street 12" water main installation from Lincoln Avenue to Central Avenue. (5,000 LF).
11.	2010	Ferris Avenue 16" water main installation from Dempster Street to Lincoln Avenue.
H	2010	Replaced one 8" gate valve and 48" vault at Golf Road and Waukegan Road. Replaced one 8" gate valve and 48" vault at 9432 Waukegan Road.
	2011	Water Meter Replacement Program: Installed Sensus Fixed Base Antenna Reading System and replaced 7,950 Water Meters.
V	2011	8" water main extension installation from School Street on Carol Avenue east to 6048 Carol Avenue.
1	2011	Installed new 8" water main on New England Avenue from Church Street to Davis Street replacing the old 6" water main.
	2011	Relocation of the 20" Feeder Main at the North Pumping Station.
1	2011	Harlem Avenue & Greenleaf Avenue (Niles) replaced 12" Gate Valve with new 12" Butterfly Valve and new 60" Vault in the parkway. Added new 20" Butterfly Valve with new 72" Vault and the street pavement.
1	2011	Replaced 200 lineal feet of 12" feeder main at Lehigh Avenue and Church Street crossing under the Metra north railroad tracks. April of 2011 it was discovered that the 12" Feeder Main was leaking directly under the railroad tracks. A 24" Casing Pipe was first pushed under the tracks and then the 12" Feeder main was installed with 2 new 12" Butterfly Valves and Vaults and one new Fire Hydrant.
	2012	Installed 280 lineal feet of 8" C900 PVC water main around the detention pond in the Trafalgar Square subdivision from the dead end of Elm Street west to Concord Drive to complete the water main loop.
	2012	Installed 280 lineal feet of 8" Ductile Iron water main on Marion Avenue from Wilson Terrace north to Foster Avenue and Marion to complete the water main loop.
	2012	Replaced 1,050 lineal feet of 6" water main on Lyons Street from Waukegan Road to Oak
4	1121	Park Avenue with 8" Ductile Iron water main.
	2012	Replaced the motor and pump on Pump No. 1 at the North Pumping Station.
	2012	Removed the foot valve in Reservoir No 1 from the suction line for Pump No. 1 and No. 4.
feet.	2012	Replaced the 300 lineal feet of 3" with 3" Ductile Iron water main in the Public Works yard for the Water/Sewer Division Building.
	2013	Replaced 500 lineal feet of 4" water main on the 6700 block of Palma Lane with new 8" C900 PVC water main.
	2013	Looped 200 lineal feet of 8" Ductile Iron water main on New Castle Avenue from Beckwith Road south to the alley.

Date of Event

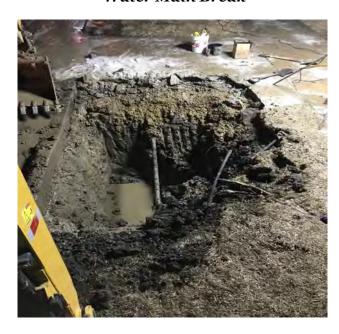
Type and Location of Event

2014	Replaced and installed 1,176 lineal feet of 8" ductile water main On Simpson Street from
1	Sayre Avenue west to end at Golf Road. Also installed two water services laterals for
2014	McGrath Audi. Replaced 1,150 lineal feet of 12" and 20" feeder main with new ductile water main from Cald-
2014	well Avenue east across the North Branch of the Chicago River to the back of the curb at the
4	driveway in Saint Paul Woods of the Cook County Forest Preserve.
2015	Installed 208 lineal feet of 8" C900 water main on Octavia Avenue from Wilson Terrace
	south to Lyons Street to complete the water main loop.
2015	Installed 235 lineal feet of 8" C900 water main on Ozark Avenue from Suffield Street north
14	to Churchill Avenue to complete the water main loop.
2016	Replaced the Standby Generator at the South Pumping Station with a new 300 kW
	Generator and new Transfer Switch.
2016	Installed 550 lineal feet of 15" Sanitary Sewer Pipe in the alley right-of-way in the 8800
	Block of Meade Avenue. Abandon in place the old sanitary pipe running in the rear yards.
2017	The Morton Grove Niles Water Commission (MGNWC or Commission) was formed to de-
M. F. Com	sign, c <mark>onstruct, finance and operat</mark> e a regional water supply system that transports and
16/2 453	d <mark>elivers clean, safe and affordable Lake Michigan</mark> water to the Villages of Morton Grove and
100	Niles. The MGNWC is invested in long–term water supply planning and manage-
1/4	ment at stabilized rates that allow for needed infrastructure improvements.
2018	Completed MGNWC water main installation from Evanston to Morton Grove.
2018	Lined 20" water main from Harlem and Dobson to South Pumping Station.
2018	Completed 8900 Meade sanitary sewer relocation .

Meade Sewer Project



Water Main Break



INSPECTION SERVICES

Rights-of-Way inspections are performed by the Public Works Water/Sewer Division personnel throughout the year on new residential, commercial, and multi-family water and sewer service connections. This provides control and protection for the Village's existing utility infrastructure and the Village residents.

J.U.L.I.E. locates are performed on all requested utility locations by public and private contractors.

Most electric, gas, water, sewer, and telecommunications companies are delivering utility services underground. To avoid personal injury and damage to those underground lines, state law requires you to contact JULIE before any digging project, regardless of the project size or depth. Both the call and JULIE's services are free.

You can prevent injury and avoid damage by following these four important steps:

- Call or Click before you dig
- Wait the required amount of time (two working days after your phone call)
- Respect the marks
- Dig with care

Notify JULIE if you are doing any of the following projects:

DECKS & PATIOSTENTSSWIMMING POOLSTREES OR SHRUBSFENCESLANDSCAPINGSWING SETSMAILBOX POSTSFOUNTAINSSIGNSROOM ADDITIONSGARDENS

You'll know what's below by the different flags, stakes or paint.

Red - Electric

Yellow - Gas, oil or petroleum

Orange - Communications

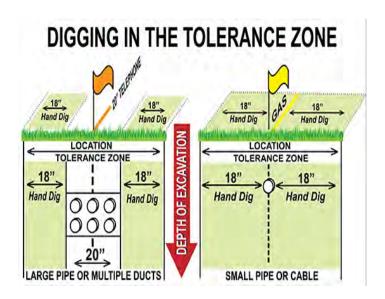
Blue - Potable water

Purple - Reclaimed water, irrigation

Green - Sewer

White - Proposed excavation

Pink - Temporary survey



PUMPING STATIONS

Mission Statement

The ultimate goal of the Pumping Station personnel is to preserve public health while furnishing adequate amounts of water for fire protection and consumption for residents and businesses. Additionally, using sound management practices and operating procedures which are economically sound and in the best interest of the Morton Grove residents. When delivering these services, the department will continue to comply with all State and Federal EPA mandates, striving to continually enhance consumer confidence in the Village's water system.

Morton Grove's water system is an essential part of our everyday lives. Over 850 million people in the world lack access to safe drinking water. Drinking water in the U.S. must meet strict standards set by the EPA. To ensure that all drinking water is safe for our residents, Pumping Station operators perform daily inspections and testing as well as monitoring supply and demand of water usage. These tests are performed 365 days a year to keep the Village drinking water safe.

WATER SUPPLY OPERATORS

The Morton Grove Pumping Stations have three full time certified water operators. These employees take care of the daily, weekly, monthly, and yearly tasks of record keeping, water sampling, building maintenance, meter repair, and numerous other jobs. This includes holidays and weekends as well. It is up to the operators to protect the health and welfare of our community ensuring that all of the strict EPA regulations are followed.

Water supply operators must follow the EPA regulations for continuing education. This ensures all water operators stay informed of new regulations as well as new ideas in the water industry. A Class "C" Water Operator must earn a minimum of 15 classroom hours to maintain his certification with the state. Last year our water operators earned over 40 hours of continuing education.



North Pumping Station

ANNUAL PUMPAGE 2018

Total water pumped for the year: 1,017,082,000 gallons (up 87,311,000 gallons from 2017).

Average monthly pumpage: 84,757,000 gallons (up 7,277,000 gallons from 2017).

Highest monthly pumpage: July with 94,516,000 gallons.

Lowest monthly pumpage: April with 78,799,000 gallons.

Average daily pumpage: 2,787,000 gallons.

Highest daily pumpage: October 22nd with 3,898,000 gallons.

Lowest daily pumpage: November 12th with 1,794,000 gallons.

2018 revealed a 9% increase in water consumption compared to 2017.

Many different factors play a key role in daily pumpage; extreme heat, bitter cold, work days, non-work days, and holidays. Because of these factors it is important that we pay close attention to what's happening in our community every day of the week.





Pump #4 2800gpm

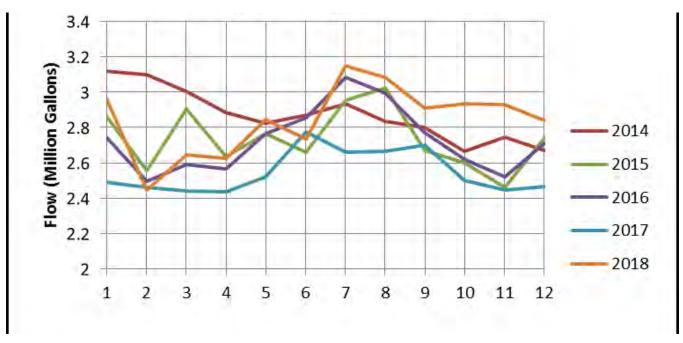
North Tower and Reservoir

METER DEPARTMENT

Water consumers of the Village of Morton Grove can request a service call if they have any water related concerns. Service requests range from high usage, noisy meter, frozen meter, remote reader malfunctions or water termination. Water consumption is monitored through a 24-hour remote reading system which detects zero or unusual water usage. If a location appears on this report, water consumers will be notified by phone call, door hanger or follow up with an appointment, upon request.

<u>MONTH</u>	SERVICE CALLS	<u>DELIVERIES</u>	TOTAL
JANUARY	22	1	23
FEBRUARY	18	2	20
MARCH	34	1	35
APRIL	9	3	12
MAY	17	2	19
JUNE	13	1	14
JULY	39	1	40
AUGUST	21	2	23
SEPTEMBER	12	1	13
OCTOBER	17	2	19
NOVEMBER	5	1	6
<u>DECEMBER</u>	<u>12</u>	<u>2</u>	14
TOTAL	219	19	238

Average Daily Effluent Flow



<u>WATER METER TESTING</u>

To ensure meter accuracy and improve efficiency, Morton Grove requires water meters to be tested. Village Personnel will test residential water meters as they are replaced. An appointment is required for staff to access the water meter. Testing generally takes one (1) hour.

Testing of Industrial, Commercial and Institutional properties will be contacted by mail or telephone by Village personnel when meter testing is required. Property owners will be fully informed of the testing procedures and of any questions that may come up. All concerns will be addressed before the test takes place and results will become available shortly thereafter. Meters that fail will be repaired and/or replaced.

This program is an annual project under the Waterworks Infrastructure Rehabilitation and Preventive Maintenance Program. A water meter is a mechanical device and, like all measurement devices, they are subject to wear and tear. Through normal usage, it can still stop working, leak or provide a low/inaccurate consumption reading. Testing allows us to improve the meter reading and billing process, resulting in improved customer service and reduced operating costs.

Village personnel tested 70 residential meters in 2018. Four large meters were tested by a private contractor.

CROSS CONNECTION

The Village of Morton Grove is required by the EPA to provide safe and potable water to its customers at all times. In order to ensure that contamination does not enter the distribution system due to backflow or backsiphonage through cross-connections, it is necessary that the premises of each water customer be inspected for cross-connection (in accordance with Ordinance #95-7). Inspections must be performed by a plumber, licensed by the State of Illinois for cross-connection control device inspections. Where a cross-connection exists, a fixed proper air gap or an approved backflow prevention device must be installed to protect the safety of potable water supply.

There are currently 773 total cross connection prevention devices in Morton Grove with many more being installed on new and existing buildings and homes each year.

In 2018, a total of four cross connection devices were inspected, in house, by Pumping Station personnel; one is located at the North Pumping Station and three are located at the Public Works Facility.



Cross Connection



OMNI 1-1/2" TO 8"



IPERL 5/8" TO 1"

CHLORINE (CL2)

Chlorine is an important chemical for water purification. Using chlorine in the water system kills bacteria and other microbes that can be harmful to humans. Chlorine is a toxic gas that irritates the respiratory system and can lead to death. It is also a strong oxidizer and can react with flammable materials. Great care must be taken when dealing with chlorine gas.

Each Pumping Station has a number of chlorine tanks used to inject chlorine into the water system as it comes into the station to ensure safe drinking water. This injection is monitored to ensure just the right amount flows into the system. These tanks must be located in a secure, ventilated place. Because chlorine gas is heavier than air, it tends to accumulate at the bottom of poorly ventilated areas. The tanks have to be replaced every few weeks. This involves the Pumping Station personnel physically removing the tanks and hooking up new ones. Precautions must be taken because chlorine gas is so harmful. All proper safety regulations must be followed to ensure the safety of the Pumping Station personnel, i.e. two employees to change one tank, ventilation fans turned on while in the chlorine room and final inspection of all connections after tank is hooked up. The Pumping Station operator attends a chlorine safety class every year, in order to review how to handle this dangerous chemical safely and know what to do in case of emergency.

In 2018, 4,206 pounds of chlorine were used.



Chlorine Storage



Chlorine Scale

WATER SAMPLES

In order for the Morton Grove Pumping Station's to supply safe and clean water to its customers, it must be properly operated and maintained. However, this alone cannot document the safety or quality of the water. To develop and maintain a record of water quality, it is necessary to collect representative samples of water and have them analyzed by a certified EPA laboratory on a routine basis. The minimum number of samples required to adequately monitor a water supply is determined by considering the water source, the type of treatment employed, the population served and the history of the water quality in the system. A total of 48 disinfection by-products samples are taken throughout the year in the Village's water system.

The Morton Grove water system is required to take a minimum of 25 samples each month (a total of 300 each year). Pumping Station personnel collected and analyzed 360 samples, all of which were within EPA guidelines.

In 2018, the Village of Morton Grove, along with other Village's, is required by the Illinois Environmental Protection Agency to sample for Unregulated Contaminants (These samples will be used to set standards for future monitoring). A total of 20 weekly samples are taken from the two distribution areas in Morton Grove.

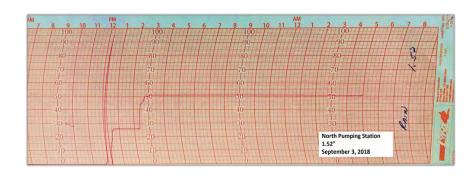


Water sample bottle must be sealed before collection of sample, and filled up to 100ml mark.

RAINFALL TOTALS 2018

The total rainfall from April 2018 to November 2018 was 31.21 inches. The average rainfall per month was 3.90 inches.

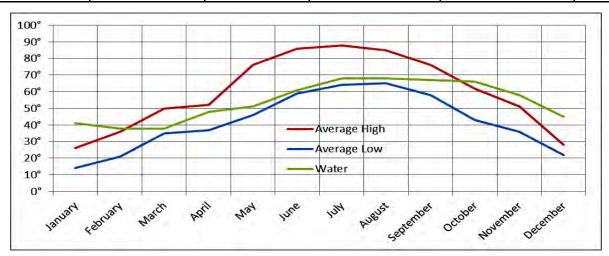
out of service January February out of service March out of service April 2.31 inches May 9.10 inches June 7.36 inches July 0.59 inches 5.40 inches August September 3.73 inches October 1.48 inches November 1.24 inches December out of service



Total: 31.21 inches

AIR & WATER TEMPERATURE

Month	Low (°F)	High (°F)	Avg. Low (°F)	Avg. High (°F)	Water Temp(°F)
January	-3	55	15	30	41
February	9	68	18	36	38
March	14	78	26	42	38
April	32	78	30	48	48
May	32	88	47	66	51
June	49	100	52	76	61
July	56	99	64	88	68
August	54	92	64	80	68
September	45	95	53	73	67
October	32	82	40	56	66
November	15	58	28	38	58
December	-9	62	22	36	45



ALARMS

The Morton Grove Pumping Stations are set up with dozens of early warning alarms as well as emergency warning alarms. These early and emergency alarms help the water operators keep the water system safe, clean, and running properly. These alarms can range from power failure, burglar alarm, pressure levels and low vault temperature.

An alarm company as well as an internal alarm system, notifies the operator "on call" so the alarm can be assessed for its danger level and requires that the operator take action immediately.

There were a total of 512 alarms in 2018, 108 occurring after working hours.

2018 ALARMS

Month	# of Alarms	During Work Hours	After Work Hours	2018 Alarms
Jan	11	11	0	53
Feb	32	24	8	72
Mar	17	15	2	90
Apr	43	41	2	140
May	23	12	11	34
Jun	48	40	8	72
Jul	84	48	36	22
Aug	58	43	15	29
Sept	14	12	2	63
Oct	37	29	8	67
Nov	46	35	11	21
Dec	99	94	5	17

Total 512 404 108 680

SECURITY

Pumping Station security is always a factor in the job of water supply operators. The operators perform a daily Ph and Orthophosphate test at both the North and South Pumping Stations. Additionally, a 2nd Ph test is taken at two predetermined sites in town (one on the east end and one on the west end) to check the water once it is in the distribution system.

Along with these tests, a daily security check of each Pumping Station is performed.

BUILDING MAINTENANCE DIVISION

This Division's priority is to monitor, maintain and verify the condition of municipal buildings and properties on a continual basis. This Division participates in setting design specifications, bidding and overseeing the preventive maintenance programs which decrease the overall cost of maintaining buildings and properties.

Building Maintenance Division plans future maintenance expenditures and helps to create and develop a comprehensive plan to address the nature, amount and timing of future capital expenditures. The division is also responsible for developing and overseeing the Public Works wellness, safety and training programs. Special events, specifically, the Morton Grove Days, held over the fourth of July is managed by this division as well. All operations, before, during and after the event are administered by Building Maintenance. Tasks include obtaining vendors and scheduling of their services, coordination of entertainment, safety of attendees, and confirming complete and proper clean up is achieved.

2018 Completed Projects of Capital Improvements to Municipal Buildings:

Civic Center

Installed sump pump in main lobby elevator.

Demoed kitchen wall for installation of plumbing for washer and dryer.

Stained fence adjacent to patio extending north toward open field.

Fire Station #4

Performed tuck-pointing where necessary near entrance and main doors.

Fire Station #5

Rebuilt deteriorating chimney.

Police Department

Modernized radio room and room adjacent to the radio room.

Village Hall

Installed new split system A/C unit for IT room.

Renovated 2nd floor women's bathroom.

Rebuilt support and replaced flooring adjacent to west entrance.

Installed new fire panel, seven pull stations, ten audio/visual warning devices and two additional smoke detectors at Village Hall and Police Department.

Installed new burner on boiler at Village Hall and Police Department.

Public Works

Installed new RTU (Roof Top Unit) for main office heat and air.

Installed four security cameras for facility.

Repaired roof leaks.

Tuck-pointed on west wall of main garage.

Rebuilt south wall at facility and tuck-pointed critical areas on four sides of main shop.

Completed roof preventative maintenance for all buildings.

EMPLOYEE TRAINING

Personal Protective Equipment (PPE)

Employees are trained to use their personal protective equipment and know when it is necessary on how to properly put it on, adjust, wear and take it off. They are also trained on the limitation of the equipment and proper care, maintenance, useful life and disposal of the equipment. Protective equipment for eyes, face, head and extremities, protective clothing, safety footwear, respiratory devices, and protective shields and barriers are prime examples.

32 Public Works Employees participated.

Fall Prevention & Protection Training

Each employee with fall hazard exposures will receive training on how to recognize these hazards and minimize them, in accordance with OSHA standards. This training will include, correct procedures for maintaining, disassembling and inspecting fall protection equipment and systems. Use and operation of quardrail, personal fall arrest, and any other fall protection systems.

32 Public Works Employees participated.

Hazard Communication

Employees will be informed of the contents of the Hazard Communication Standard, the hazardous properties of the chemicals with which they work and safe handling procedures and measures employees can take to protect themselves from these chemicals. Our employees are trained on the hazardous chemicals and work related practices used at the Public Works Facility. They are aware of where this information is stored and accessed, proper labeling, safe use, maintenance and handling procedures for emergency response.

32 Public Works Employees participated.

Flagger Training

Employee's are trained along the roads and highways to help traffic keep flowing through a construction zone, despite a shutdown of lanes.

32 Public Works Employee's participated.





SAFETY TRAINING

The Public Works Safety and Training Committee continues their dedication in achieving their goals and commitments towards a safe working environment and employee wellness. It continues to provide training options and opportunities for staff development and the development of safe practices, procedures, and policies, continuing the trend of reducing incidents and accidents in the work place.

Confined Space Entry Program

The goal of the Confined Space Entry Program is to fully analyze all hazards of confined spaces on the Village premises and determine safeguards to eliminate or control hazards that could result in serious personal injury or death. Examples of confined spaces found within the Village are manholes, underground vaults, storage tanks, water towers, and valve pits.

32 Public Works Employee participated.

Excavation and Trench Rescue Operations

Both trenches and excavations expose employees to the same hazard of unstable soil conditions with the potential for cave-ins. Training helps identify existing and predictable hazards in the vicinity of the excavation/trench area and determines prompt corrective measures to eliminate them. Excavation and trenches are most commonly found within the Village's utility (gas, electric, water and sewer) installations or repairs.

32 Public Works Employees participated.

Blood Borne Pathogens

Blood borne pathogens are infectious microorganisms in human blood that can cause disease in humans. Training helps us recognize the ways exposure and transmission are likely to occur in our particular situation, whether it is providing first aid, cleaning up from an accident, or the pickup and disposal of trash or animal remains. Workers are trained to protect themselves with the use of proper personal protective equipment.

32 Public Works Employees participated.

<u> 2018 Hands-on Training</u>

- Respirator protection —32 of our employee's participated and fitted for respirators.
- Audiogram testing—32 of our employee's participated and passed.
- Back Safety training (lifting techniques)—32 employee's participated.
- Haz-Mat-First responder—32 employee's participated.
- Underground storage tank training—2 employee's participated.
- Alcohol and Substance Abuse Reasonable Suspicion training—Public Works supervisors attended.



WHAT IS ARBOR DAY?

The origin of Arbor Day dates back to the early 1870's in Nebraska City, Nebraska. A journalist by the name of Julius Sterling Morton moved to the state with his wife, Caroline, in 1854. As newcomers to the young state, the couple purchased 160 acres in Nebraska City and planted a wide variety of trees and shrubs in what was primarily a flat stretch of desolate plain.

Julius Sterling Morton also became the editor of the state's first newspaper, Nebraska City News, which became a perfect platform for Morton to spread his knowledge of trees, and to stress their ecological importance within Nebraska. His message of tree life resonated with Nebraskans, many of whom recognized the lack of forestation in their community.

The first ever Arbor Day was held on April 10, 1872, and it was a wild success. Morton led the charge in the planting of approximately one million trees. The tradition quickly began to spread and schools across the country started to participate in Arbor Day every year. Morton Grove Public Works participates in speaking with schools about the importance of Arbor Day and the benefits of trees.









NATIONAL NIGHT OUT

National Night Out is an annual community event hosted by the Police Department with the assistance of Public Works. This partnership and neighborhood camaraderie is to make our neighborhoods a safer place to live. National Night Out enhances the relationship between neighbors and law enforcement/public works while bringing back a true sense of community. Furthermore, it provides a great opportunity to bring police/public works service and neighbors together under positive circumstances.





SWANCC RECYCLING EVENT

As a courtesy to SWANCC (Solid Waste Agency of Northern Cook County) community residents, this agency provides an opportunity to Morton Grove and all member communities to destroy sensitive documents and recycle electronic devices such as; medical records, tax forms, bank statements, T.V.'s, and printers. Seasonal document destruction and electronic recycling events can be scheduled annually between May and October. Morton Grove schedules this event on the 3rd Saturday of May, each year. In 2018, Morton Grove had 605 vehicles participate in this event.



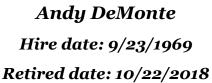






GONE FISHING...





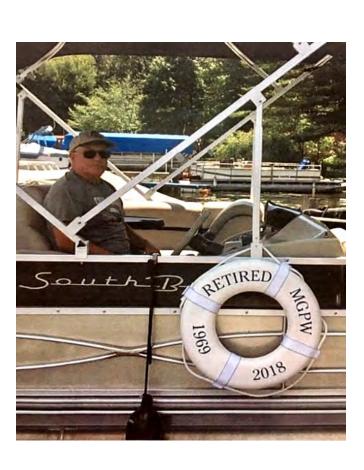
It has been my privilege to have worked with Andy over my 40 years at Public Works. Andy began working for Public Works in 1969, he excelled working in the Street Division and later in the Water Division. Andy became a Certified Water Operator and eventually became the Superintendent of the Water/Sewer Division.

In 2003, Andy was appointed to Director of Public Works. Many milestones and accomplishments were realized during his 15 years as the Director of Public Works. Andy always put his service towards community and the concerns of the good people of Morton Grove. I wish him well in his retirement and know that he has influenced my abilities as the next Public Works Director.

All the best to you and Sherry on your new adventure.

-Joe Dahm















Paul Tobin
Hired date: 8/03/1987
Retired date: 11/27/2018

Paul Tobin wore many hats for Public Works over the last 30 years. Paul began his Public Works career as a mechanic in the Vehicle Maintenance Division. Paul was later promoted to the Superintendent of the Street Division, where he devoted many hours keeping the streets safe in the winter and handling a wide variety of other departments such as Forestry, Street, Landscaping, and weather related issues without incident. We will miss your witty sarcasm and caring nature.

All the best to you and Ann on your new adventure.

-Joe Dahm









Welcome to Public Works...



Jacob Zuckerman Hired date: 08/27/2018 Water/Sewer Division