

Greeley City Council Agenda

Work Session

Tuesday, February 8, 2022 at 6:00 p.m.

City Council Chambers at City Center South, 1001 11th Ave, Greeley, CO 80631

Zoom Webinar link: <https://greeleygov.zoom.us/j/93148588956>

NOTICE:

City Council Work Sessions are held on the 2nd and 4th Tuesdays of each month in the City Council Chambers. Meetings are conducted in a hybrid format, with a Zoom webinar in addition to the in person meeting in Council Chambers.

City Council members may participate in this meeting via electronic means pursuant to their adopted policies and protocol.

Members of the public are also invited to view Council work sessions in person or remotely. **Work sessions do not include public input in any format. Public comment is only permitted at regular Council meetings on the 1st and 3rd Tuesdays of each month.**

Watch Meetings:



Meetings are open to the public and can be attended in person by anyone.



Meetings are livestreamed on YouTube at youtube.com/CityofGreeley as well as over the Zoom webinar. Public participation in the Zoom webinar only allows viewing the meeting.

For more information about this meeting or to request reasonable accommodations, contact the City Clerk's Office at 970-350-9740 or by email at cityclerk@greeleygov.com.

Meeting agendas, minutes, and archived videos are available on the City's meeting portal at greeley-co.municodemetings.com/





Mayor
John Gates

Councilmembers

Tommy Butler
Ward I

Deb DeBoutez
Ward II

Johnny Olson
Ward III

Dale Hall
Ward IV

Brett Payton
At-Large

Ed Clark
At-Large

A City Achieving
Community Excellence

Greeley promotes a healthy, diverse economy and high quality of life responsive to all its residents and neighborhoods, thoughtfully managing its human and natural resources in a manner that creates and sustains a safe, unique, vibrant and rewarding community in which to live, work, and play.

City Council Work Session Agenda

February 08, 2022 at 6:00 PM

**City Council Chambers, City Center South, 1001 11th Ave &
via Zoom at <https://greeleygov.zoom.us/j/93148588956>**

1. Call to Order
2. Pledge of Allegiance
3. Roll Call
4. Reports from Mayor and Council Members
5. Scheduling of Meetings, Other Events
6. COVID-19 Update
7. Residential Water Meter Project and Customer Service Update
8. Overview of the use, sales, response and enforcement of Fireworks in the City of Greeley.
9. Adjournment

Work Session Agenda Summary

Title:

Reports from Mayor and Council Members

Background:

During this portion of the meeting any Council Member may offer a summary of the Council Member's attendance at assigned board/committee meetings and should include key highlights and points that may require additional decision and discussion by the full Council at this or a future Worksession.

Board/Committee	Meeting Day/Time	Assignment
--Team of 2-- Board/Commission Interviews	Monthly as Needed	Council Rotation
Water & Sewer Board	3 rd Wed, 2:00 pm	Gates
Youth Commission Liaison	4 th Mon, 6:00 pm	Clark
Historic Preservation Loan Committee	As Needed	DeBoutez
Human Relations Commission	2 nd Mon, 4:00 pm	DeBoutez
Police Pension Board	Quarterly	Clark
Employee Health Board	As Needed	DeBoutez
Airport Authority	3 rd Thur, 3:30 pm	Payton/Clark
Visit Greeley	3 rd Wed, 7:30 am	Butler
Upstate Colorado Economic Development	Last Wed, 7:00 am	Gates
Greeley Chamber of Commerce	4 th Mon, 11:30 am	Hall
Island Grove Advisory Board	1 st Thur, 3:30 pm	Butler
Weld Project Connect Committee (United Way)	As Needed	Butler
Downtown Development Authority	3 rd Thur, 7:30 am	Butler/DeBoutez
Transportation/Air Quality MPO	1 st Thur, 6:00 pm	Olson/Payton
Poudre River Trail	1 st Thur, 7:00 am	Hall
Interstate 25 Coalition	As Needed	Olson
Highway 85 Coalition	As Needed	Gates
Highway 34 Coalition	As Needed	Olson
CML Policy Committee (Council or Staff)	As Needed	Payton/Lee Gates alternate
CML Executive Board opportunity	As Needed	Hall
CML - Other opportunities	As Available/Desired	

Work Session Agenda Summary

Title

Scheduling of Meetings, Other Events

Summary

During this portion of the meeting the City Manager or City Council may review the attached Council Calendar or Worksession Schedule regarding any upcoming meetings or events.

Attachments

Council Meetings and Other Events Calendar

Council Meeting and Work Session Schedule

Status Report of Council Initiatives and Related Information

City Council Meeting Scheduling 2022

Current as of 2/3/2022			
This schedule is subject to change			
Date	Description	Sponsor	Placement/Time
February 8, 2022 Worksession Meeting	COVID-19 Update	Raymond Lee	
	Water Meter Replacement Project Update	Sean Chambers	
	Discussion regarding the Sale and Use and Enforcement of Fireworks in the City of Greeley	Brian Kuznik	
	Executive Session - City Attorney performance review	Kathleen Hix	
February 15, 2022 Council Meeting	COVID-19 Update	Raymond Lee	
	Resolution - Stormwater Bonds	John Karner	Consent
	Ordinance - Second Reading and PH and Resolution -Stormwater 2022 Series Bond Issuance	John Karner	Regular
	Board and Commission Appointments	Stacey Aurzada	Regular
	Executive Session - Municipal Judge performance review	Kathleen Hix	
February 22, 2022 Worksession Meeting	cancelled		
March 1, 2022 Council Meeting	Proclamation for Youth Art Month	Kelly Snook	
	COVID-19 Update	Raymond Lee	
	Intro - Ordinance - Setting salaries of City Council Appointees	Kathleen Hix	Consent
	Intro - Ordinance disposing of Irrigation Co shares for water rights trade and acquisition agreement	Sean Chambers	Consent
March 8, 2022 Worksession Meeting	COVID-19 Update	Raymond Lee	
	Recycling Update	Paul Trombino	
	Quiet Zones Update	Paul Trombino	0.25
	Discussion regarding Ward Boundary Adjustment	Becky Safarik/Stacey Aurzada	
	Review and discuss Water Rights Trade & Acquisition Agreement	Sean Chambers	
	Greeley Public Safety Picture	Adam Turk	
March 15, 2022 Council Meeting	COVID-19 Update	Raymond Lee	
	University of Northern Colorado update		
	Ordinance - PH and Second Reading-Setting salaries of City Council Appointees	Kathleen Hix	Regular
	Ordinance - PH and Second Reading - Disposition of Irrigation Co shares for water rights trade agreement	Sean Chambers	Regular
	Board and Commission Appointments	Stacey Aurzada	Regular

February 7, 2022 - February 13, 2022

February 2022

Mo	Tu	We	Th	Fr	Sa	Su
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28						

March 2022

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Monday, February 7

Tuesday, February 8

6:00pm - City Council Worksession Meeting (Council Chambers and via Zoom) - Council Master Calendar 

Wednesday, February 9

Thursday, February 10

7:30am - Poudre River Trail (Hall) 

Friday, February 11

Saturday, February 12

Sunday, February 13

February 14, 2022 - February 20, 2022

February 2022

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March 2022

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Monday, February 14

Tuesday, February 15

6:00pm - City Council Meeting - Council Master Calendar

Wednesday, February 16

2:00pm - 5:00pm Water & Sewer Board (Gates)

6:00pm - 7:30pm Community Conversations- Homeless and Housing Alternatives (Virtual via zoom) - Council Master Calendar

Thursday, February 17

7:30am - 8:30am DDA (DeBoutez/Butler)

3:30pm - 4:30pm Airport Authority (Clark/Payton)

6:00pm - 7:30pm Community Conversations- Homeless and Housing Alternatives (in person) (Greeley Recreation Center- 651 10th Avenue, Room 101 ABC) - Council Master Calendar

Friday, February 18

3:00pm - 9:00pm Special Worksession- Council retreat (Active Adult Center)

Saturday, February 19

8:00am - 5:00pm Special Worksession- Council retreat (Active Adult Center)

Sunday, February 20

8:00am - 5:00pm Special Worksession- Council retreat

February 21, 2022 - February 27, 2022

February 2022

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March 2022

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Monday, February 21

Tuesday, February 22

6:00pm - City Council Worksession Meeting - Council Master Calendar

Wednesday, February 23

7:00am - 8:00am Upstate Colorado Economic Development (Gates/Hall) (Upstate Colorado Conference Room) - Council Master Calendar

Thursday, February 24

7:30am - Poudre River Trail (Hall)
5:30pm - 8:30pm Greeley Area Chamber of Commerce Dinner (Gates/Olson/DeBoutez/Hall) (Island Grove Events Center 425 N 15th Ave)

Friday, February 25

Saturday, February 26

Sunday, February 27

February 28, 2022 - March 6, 2022

February 2022

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March 2022

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Monday, February 28

- 11:30am - 12:30pm Greeley Chamber of Commerce (Hall) Ⓞ
- 6:00pm - 7:00pm Youth Commission (Clark) Ⓞ

Tuesday, March 1

- 6:00pm - City Council Meeting (Council Chambers and via Zoom) - Council Master Calendar Ⓞ

Wednesday, March 2

Thursday, March 3

- 3:30pm - IG Adv. Board (Butler) Ⓞ
- 6:00pm - MPO (Olson/Payton) Ⓞ

Friday, March 4

Saturday, March 5

Sunday, March 6

Greeley City Council

Status Report of Council Initiatives

Initiative No.	Council Member Initiating	Council Request	Council Meeting or Work Session Date Requested	Status or Disposition (After completion, item is shown one time as completed and then removed.)	Assigned to:
03-2021	Hall	Request for formation of a committee, to be chaired by Council Member Hall, regarding the section of the Poudre River Trail known as the Narrows. This section is facing increasing risks of erosion, with some portions in danger of falling into the river, and no available alternative areas for trail placement in that vicinity. The School of Mines will do a project to work on some engineering solutions for the area, in addition to other engineering studies that have already been done. The committee will review and determine options to move forward in addressing this with the assistance of City staff. City Manager Otto added information about potential Capital Improvement Projects through this area, and Council Member Hall provided information about existing potential rough cost estimates.	February 2, 2021 Council Meeting	<p>Update 12/7/2021 Council Member Hall reported in the last 6 months, 30 feet of trail has started becoming undermined and must be shored up immediately, likely requiring some short term dollars while awaiting a longer solution.</p> <p>Update: 04/20/2021 Council Member Hall reported the committee had its first meeting and he is pleased with engagement from City staff and the community.</p> <p>A committee, chaired by Council Member and Poudre River Trail Corridor Chairman Hall, has been formed with representatives from the Poudre Trail Corridor Board, Culture, Parks and Recreation/Natural Areas and Trails, Public Works, Water and Sewer, the Poudre River Run Master HOA, a member of the Parks and Recreation Advisory Board, and a representative from the Ditch #3 Board. Committee Chairman Hall has also referenced initial communications with Otak Engineering, a consulting firm who produced</p>	Kelly Snook

Initiative No.	Council Member Initiating	Council Request	Council Meeting or Work Session Date Requested	Status or Disposition (After completion, item is shown one time as completed and then removed.)	Assigned to:
				a study of this area in 2018 for the City of Greeley, as well as the Colorado School of Mines engineering students who will conduct a capstone project this semester towards a suggested course of action and suggested funding mechanism(s). An initial assessment with design parameters, recommended course(s) of action including recommended funding sources, is expected in June, 2021 post consultation with the Mines student project and engineering consultants. Although this project will carry on m practicality through committee work	
14-2021	Butler	Request to have a discussion on railroad quiet zones and safety at a work session.	December 7, 2021 Council Meeting	Scheduled for a work session in early 2022	Paul Trombino
15-2021	Olson	Formation of a committee for implementation of a funding strategy for the 35 th and 47 th interchanges.	December 7, 2021 Council Meeting	Council Member Olson will be following up with Manager Lee and Director Trombino on next steps	Paul Trombino

Work Session Agenda Summary

Key Staff Contact: Raymond Lee, City Manager, 970-350-9750

Title:

COVID-19 Update

Summary:

There will be a brief update to Council regarding COVID-19. The latest updates are available via the City's Dashboard:

<https://www.arcgis.com/apps/dashboards/78156f8c2f104973a00b40711296e8ae>

Worksession Agenda Summary

February 8, 2022

Sean Chambers, Water & Sewer Director, 970-350-9815

Title:

Residential Water Meter Project and Customer Service Update

Background:

With aging water meters, extended mechanical wear, and batteries exceeding their operable life, the Water & Sewer Department budgeted to replace and update its meters to industry standard equipment. The multi-year meter replacement project will replace aging and failing meter infrastructure and improve service to our customers. The replacement meters meet all industry standards, and when installed provide the city with accurate reads and water use data that can catch water leaks. The new meters have the ability to share use data with the city's WaterSmart customer portal and water management tools, enabling each customer to view their current use and history. New water meters will help the customer or city identify water leaks before they become costly, and they will empower customers to actively manage their water use. The replacement meters are the industry standard, capable of storing and transmitting more water use data, and the city's installation vendor will be working to install another 6,250 plus water meters in 2022. The '22 work plan has installations starting in February, and will again address areas where there is a high incidence of meter communication failure from the old meters. Meter project information and an interactive map are available at: <https://greeleygov.com/services/ws/water-budget/metering>

Because the meter project provides a great opportunity for water efficiency, the city's project received a Bureau of Reclamation (BoR) WaterSMART grant in 2020 for ~\$1.45 Million dollars to supplement the city budget for the first 3 years of the project. The first phase of the project kicked off in 2021, but was immediately slowed by meter availability supply chain issues and a labor shortage impacting the installation contractor, UMS. Once the meter inventory was received, the majority of phase one installations were done between June and November 2021. In this first phase, the city and its vendor, UMS, ran into some quality control challenges that we have since established procedures to prevent. The city has bolstered the utility billing customer service staffing and response, with back up support and escalation protocols that provide W&S Dept. resources to augment utility billing needs. The city has also enhanced our customer communications and pre-installation property owner notices.

In addition to the 6,250 replacements per year, the city is tackling the growing list of those meters that have failed in use. This is an equally valuable scope of work to prevent further customer service and billing issues.

As this important infrastructure project moves forward, the city wants to ensure we've addressed the challenges experienced in 2021. A brief summary of the 2021 phase 1 project is below for your edification.

2021 Challenges and Response:

1. Installation labor was difficult to obtain, untrained and needed more vendor oversight and quality control from their organization.
2. Some meter pits are plumbed in unique and complicated ways that required escalation of questions on proper installation.
3. Some meter pits are covered by shrubs, mulch, raised flower beds, etc., and could not be located by the meter replacement technicians, despite the city's provision of notes and maps.
4. The "no read" list of residential water meters that are not communicating grew faster than the city's meter shop could keep up. These "no read" meters are on routes all across the city, and only some can be addressed by the UMS vendor.
5. City has tried to hire seasonal labor, and has some meter shop working weekend to address the growing no read meter list. This work is important to customer service and accurate billing.
6. Water & Sewer Dept. leadership, the project manager and city meter shop did not plan for the level of significant back-up support and quality control that was needed to catch vendor installation mistakes or other customer concerns.
7. The delay in meters caused the installation timeline to overlap with peak summer irrigation season, a time when more customers exceed their water budget, experience leaks, or simply use more than expected and the customer needs engaged customer support from the city on these types of use and billing issues.
8. From June through September of 2021, there were 17 customers, or approximately 0.4% of the new meter installations that had an installation problem due to unorthodox plumbing in the meter pit and inexperienced installation technicians. That issue caused very large water bills for those 17 customers.
9. Word of the large water bills being correlated to improper installation spread on social media with messages that "if you had a large water bill, it was likely the new meter." Due to the irrigation season, there were a significant number of customers with large bills and concerns about the cause.
10. The significant number of concerned customers, not all from Greeley, generated high customer service phone call, email and walk requests for customer service. The calls overwhelmed the city's Utility Billing staff and their voice mail system, exacerbating the customer concerns.
11. New meter installations were paused in early October of '21 to ensure meter installation training by the vendor, and to address quality control strategies.
12. W&S Dept. staff in coordination with the Finance Dept. and its utility billing staff worked out customer service back up support plans to augment utility billing as needed and escalate complicated water use calls to the W&S Dept. conservation staff trained in this type of data review. with IT to correct some issues with the voice message system,

13. The Water and Sewer Department, in coordination with Finance, who oversees the city's utility billing function, and Communications and Engagement staff have enhanced communications and the customer service response.
14. The Water and Sewer staff hosted a Town Hall Webinar on November 18, 2021 to further engage with customers and directly responds to concerns. Newsletter and web resources, social media resources, Tribune advertisement and a press release were communicated on several platforms in both English and Spanish.
15. Staff have planned the phase 2, meter replacement project to be outside of the irrigation season and have obtained the meter stock necessary to execute the next phase of the project.

The phase 1 project challenges highlighted areas where our customer service needed additional resources, technology, and back-up protocols. Together with Finance and Utility Billing, we have implemented standard operating procedures (SOPs) for coordination of new customer engagement, water budget updates, meter replacement customer service, and cross departmental call log and follow up tracking to better measure our efforts to deliver a high level of customer support and service.

Throughout this meter infrastructure replacement project, the city remains focused on delivering tools that enhance the customer experience, providing consistent customer communication about the project, and ensuring the subsequent phases of meter installation occur smoothly. The next phase of meter replacement installations will kick off in February of 2022 and run through May or June. The project will have experienced labor on the installations and meter shop support. Subsequent phases of the project will require that the meter replacement installation work takes place outside the prime irrigation season as to limit future issues and better manage the customer call volume year round. Water & Sewer's conservation staff will remain committed to augmenting utility billing staff and acting in an escalation roll for calls that have complex issues requiring data analysis.

Strategic Work Program Item or Applicable Council Priority and Goal:

Infrastructure & Growth: Establish the capital and human infrastructure to support and maintain a safe, competitive, appealing and successful community.

Attachments:

Presentation Slides

Water Meter Replacement Project Update

Greeley City Council

Worksession Presentation

February 8, 2022



Agenda

1. Metering System Overview
2. Multi-Year Phased Replacement Plan
3. 2022 Replacement Plan Project
4. Lessons Learned and Project Adjustments
5. Customer Notice, Communication & Resources
6. Questions and Discussion

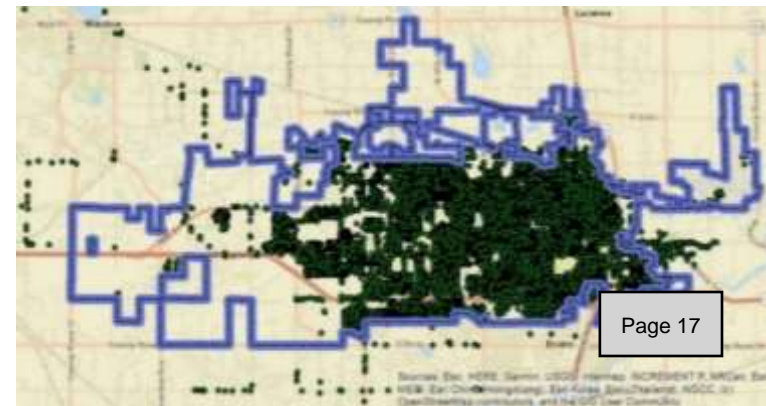


Greeley Water Meter System Background

~ 30,000 active meters on the city's potable water system

- Greeley's Meters are aging and no longer consistent with industry standards
- A growing percentage of the city's water meters are failing
 - End point communication device failure and battery failure
 - Failing meters prevent the city from obtaining meter reads
 - "No reads" generate additional customer service
 - Additional vehicle trips and staff hours
 - Estimates for reads that can not be obtained
- **City has replaced 1,420 failing no read failing meters since 2020**
- Old meter technology only provide date once per month

Existing Residential Water Meters



Multi Year Replacement Program

Phase 1 (2021): Replacing Greeley's aging meter infrastructure

- Meter routes with high incidents of meter communication failure
 - Battery life and end point communication failures
- UMS replaced 6,250 meters on defined routes
- BoR WaterSMART Grant for ~\$1.45M match against city cost

Phase 2 – 5 : 2022 – 2025 Work Plan Overview

Phased replacement plan

- Replacing at least 6,250 meters per year
 - Will also work the zero read meter fail list with city staff
 - Enhanced customer service and communication to support
- **Goal:** To replace all 29,500 residential analog meters by end 2025



Project Challenges in the Field

- Hidden or buried meters are at times difficult to locate
- Locating hidden meters often requires city assist and may impact landscapes



Meter Pit in Shrubs



Failing Water Meter



Phase 2 - Project Update

- Under contract with UMS (vendor) for next phase of 6,250 high priority meter replacements
 - Prioritizing routes with highest rates of communication failure
 - Refined quality control process with UMS and city staff
 - Enhanced communication tools and notice for customers
 - Back up staffing plan to better support utility billing
- Yr. 2 - (2022) water meter project timeline
 - Feb. '22 – May or June '22 (weather dependent)
- Ongoing work to address the “zero read” list
 - Addressing these limits future customer service needs



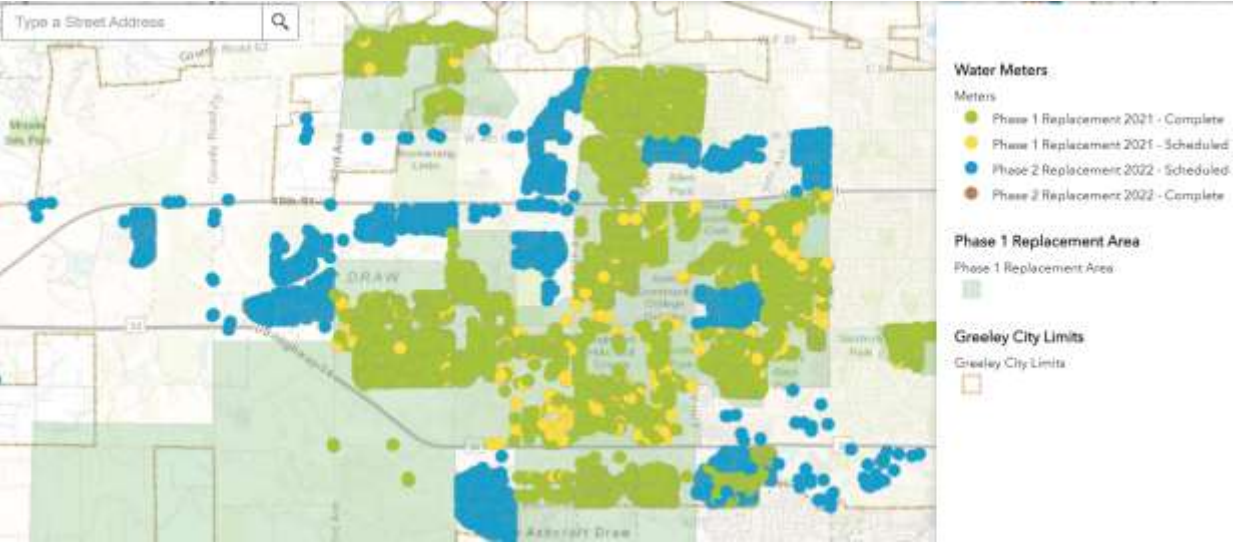
Addressing Lessons Learned

- **Summer irrigation season utility bills increase customer service call volume and the need for escalation resources**
 - Meter replacement installations should not overlap peak irrigation
 - Customer service back-up and Conservation Team escalations
- **Enhanced Customer Communications and Resources**
 - Direct Mail, Social Media, *Water Why (Youtube)*, Webinar
 - Interactive GIS mapping of meter replacement work plan
 - City staff working to replace “no read” and indoor meters outside UMS scope
- **City Quality Control Collaboration with Vendor**
 - City staff spot checks, and water use reports that flag issues
 - Weekly meetings with Utility Billing, UMS and project team

Information for Customers

Customer Access to Meter Replacement Schedule

- Interactive GIS mapping with updated info on routes scheduled for replacement.



- <https://gis.greeleygov.com/portal/apps/webappviewer/index.html?id=6ff743a7ffa049608f069391e75958b7>

Coming to your neighborhood soon!

Advanced Water Meters

Quick Answers

- You do not have to be home during installation.
- Water service will be disrupted for 15-30 minutes while your meter is replaced.
- This is at no cost to you.
- New meters will help you manage your water usage better.
- Quick and easy leak detection.
- Create your account at greeley.watersmart.com.

Questions?
Call (970) 350-9811

Dear resident,

Your water meter is scheduled to be replaced in the coming month. The city of Greeley will replace your old and/or failing water meter with the help of its contractor, Utility Metering Solutions.

Our crews will attempt to contact you prior to this occurrence, but you do not have to be home. If you are home, your water will be off for 15-30 minutes while your meter is replaced. If you are not home, your residence will still experience this shut-off and crews will leave a door hanger at your front door.

Here's what it means to you:

More accurate water billing, more control over water use, and fewer trucks rolling through the neighborhoods to collect readings. These new water meters are in direct connection with the city and report water usage in real time. Gone are the days of finding out a month too late that the sprinkler system sprouted a leak.

You can monitor your water at home, while you're away, even set leak alerts.

Customers who get new meters should connect to WaterSmart to manage their systems. Customers will be able to do this via the existing WaterSmart platform online at <https://greeley.watersmart.com>.

greeleygov.com/advanced-water-meters

Meter Replacement Advanced Notice Customer Direct Communications

Notice to customers with an indoor meter

Sent to routes scheduled for replacement within 45 days

Ready for your new water meter?
¿Está listo para recibir su nuevo medidor de agua?

When you sign up for GreeleyWaterSmart.com, you will be able to:

- Track your daily water use
- Learn easy ways to save water indoors/outdoors.
- Catch water leaks early before they become costly
- Set leak alarms and personalized high-use alerts

To get started on WaterSmart, provide your:

- Greeley Water account number
- your address and
- your email address

Al registrarse en GreeleyWaterSmart.com, usted podrá:

- Obtener lecturas diarias sobre su consumo de agua
- Aprender maneras fáciles de ahorrar agua dentro y fuera de su casa
- Descubrir a tiempo las fugas de agua antes de que estas se conviertan en un alto costo
- Programar alarmas de fugas y alertas de alto consumo de agua personalizadas

Para iniciar con WaterSmart, proporcione lo siguiente:

- Número de cuenta del agua de Greeley
- Su domicilio
- Su correo electrónico

greeleygov.com/smartmeters



1001 11th Ave. St #200
Greeley, CO 80631
(970) 350-9811

Please call (970) 350-9320 to make arrangements for a time to replace your inside meter at no cost to you. It only takes 10-15 minutes to complete.

Por favor llame al (970) 350-9320 para fijar una fecha para actualizar o reemplazar el medidor que esta dentro de su casa. Este servicio no le costar nada, y se lleva aproximadamente de 10 a 15 minutos.

GREELEY RESIDENT
800 22ND AVE
GREELEY CO 80631

4 0002W1

PSRST STD
U.S. Postage
PAID
Greeley, CO
Permit #383

Ready for your new water meter?
¿Está listo para recibir su nuevo medidor de agua?

The City of Greeley is installing new water meters to replace aging infrastructure and give residents better management over their monthly water bills.

La Ciudad de Greeley estará instalando medidores de agua nuevos para reemplazar la infraestructura envejecida y brindar a los residentes una facturación de agua mensual más precisa.

When you get your new water meter, you can expect:

- To be **empowered** to adjust your water habits to your budget.
- To **control** your household water use based on real-time data.
- Improve your **sustainability** by reducing water leaks.

Al recibir su medidor de agua nuevo, usted podrá:

- Tener la **facultad** de ajustar sus hábitos sobre el consumo de agua a su presupuesto.
- **Controlar** el consumo de agua de su hogar en base a la información de las lecturas en tiempo real.
- Mejorar la **sustentabilidad** al reducir fugas de agua.

greeleygov.com/smartmeters



WaterSmart Tools for Customer Viewing and Managing Water Use



Questions?



Web Resources:

<https://www.greeleygov.com/smartmeters>

Customer Support Contact Information:

Phone: 970.350.9811

Email: Conserve@Greeleygov.com



CUSTOMER
SUPPORT

Worksession Agenda Summary

February 8, 2022

Brian Kuznik, Fire Chief, 970-350-9501

Adam Turk, Interim Police Chief, 970-351-5381

Title:

Overview of the use, sales, response and enforcement of Fireworks in the City of Greeley.

Background:

On October 21, 2021, TNT Fireworks requested information from the Fire Department regarding the application process, fees, and permitted sales dates for fireworks within the City of Greeley (City) limits. The request was specific to the sales of permissible fireworks within the City from two temporary fireworks stands in the days preceding the 2022 New Year's holiday. The request to sell permissible fireworks was denied in accordance with the current City policy which limits the sales of permissible fireworks to a 2-week period preceding the Independence Day holiday.

Permissible fireworks, also known as consumer fireworks, are defined by C.R.S. §24-33.5-2001 as those firework devices designed to produce audible or visual effects by combustion. Permissible fireworks are considered legal in the State of Colorado and are more easily defined as those firework devices that do not explode and/or leave the ground. The amount of pyrotechnic composition and explosive material within permissible fireworks is much lower when compared to those aerial firework devices used for public display. Permissible firework devices are typically sold as cylindrical fountains, cone fountains, ground spinners, and sparklers, to name a few.

According to C.R.S. § 24-33.5-2002, it is unlawful for any person to possess or discharge any fireworks, other than permissible fireworks, anywhere in the State of Colorado. Additionally, C.R.S. § 24-33.5-2003 gives any governing body the power to adopt reasonable rules and issue permits within its jurisdiction for the retail sale of fireworks. Furthermore, C.R.S. § 24-33.5-2007 explains that municipalities may further regulate and prohibit the sale, use, and possession of fireworks, including permissible fireworks, within the limits of any city.

The Fire Department, pursuant to [Greeley Municipal Code Sec. 14-481](#), may adopt reasonable rules and regulations for the granting of permits for the retail sale of fireworks within the city. Additionally, the City's Policy for Public Distribution (PPD) 78-4 limits the sales of fireworks within the City to two (2) full weekends commencing in late-June and concluding immediately after the 4th of July Holiday. In 2021, the approved sales dates were June 25, 2021 through July 5, 2021.

The Police Department receives fireworks complaints from residents across the City. The complaints are typically related towards those individual's in possession and using illegal fireworks. Illegal fireworks produce noise complaints, risk of personal

injury, and quality of life issues. The majority of the complaints occur between June 20th and July 10th of any given year.

The Police Department has compiled data from the past five years including the number of calls for service and the disposition of these complaints. Fireworks complaints provide challenges to the Police Department as by ordinance and law they are considered "minor" violations and are currently classified as a low priority call for service. The complaints also create staffing challenges due to resources dedicated to the Greeley Stampede and patrol resources needed to handle calls for service during this busy time period.

The volume of illegal fireworks activity experienced in recent years has been significant and, though staff is seeking feedback on this item, it is highly unlikely that any of the proposed options below will fully eliminate the use of illegal fireworks within the City.

Strategic Work Program Item or Applicable Council Priority and Goal:

We are Greeley Proud.

Options:

This work session item is being presented for informational and discussion purposes with direction sought on the following identified options:

1. Option 1 - No action - Information and feedback only concerning the existing City policy (attached), which limits the sales of permissible fireworks within the City to a 2-week period around the 4th of July Holiday.
2. Option 2 - Modify existing ordinance in which permissible fireworks would remain legal in the City with potential modifications including but not limited to:
 - a. Add dates and times that permissible fireworks are allowed to be sold and used in the City
 - b. Add language that would allow the City Manager to ban the use of fireworks in the City during times of extreme weather, drought, red flag warnings, etc.
 - c. Increase the penalty for violations of fireworks ordinance with an escalated fee structure for subsequent violations.
3. Option 3 - Revise the existing ordinance to prohibit the possession, manufacture, storage, sale and use of ALL fireworks in the City.
 - a. Public fireworks displays conducted by a certified fireworks display operator would be still be allowed with the approval of the Fire Chief and Police Chief.
 - b. Current Colorado cities with a similar ordinance include:
 - i. Arvada
 - ii. Boulder

- iii. Colorado Springs
- iv. Fort Collins
- v. Northglenn
- vi. Thornton

Attachments:

PowerPoint Presentation

Fireworks

Sales, Use, Response, and Enforcement

February 8, 2022
City Council Worksession



Objectives

- **Provide information and background on:**
 - **State and Local code and policy regarding fireworks**
 - **Fireworks sales within Greeley**
 - **Fire and PD fireworks related response data**
 - **Enforcement efforts and challenges**
 - **Benchmarking information from other communities**
- **Obtain Council direction on ordinance change options**

State Statutes - Fireworks

- **§ 24-33.5-2002:**
 - **Makes it unlawful for any person to possess or discharge any fireworks, other than permissible fireworks, anywhere in this state.**
- **§ 24-33.5-2003. Permits**
 - **Governing bodies have the power to adopt reasonable rules and issue permits within its jurisdiction for the storage and retail sales of fireworks, including permissible fireworks.**
- **§ 24-33.5-2007. Regulation by municipalities**
 - **Municipalities may further regulate and prohibit the sale, use, and possession of fireworks, including permissible fireworks, within the limits of any city.**

Greeley Ordinances - Fireworks

- **Sec. 14-480 - Definitions**

- **Permissible fireworks**: small fireworks devices designed to produce audible or visual effects by combustion and are classified as **consumer fireworks***.

- **Illegal Fireworks: explodes on the ground or in the air. (Skyrockets, bottle rockets, roman candles, aerial shells, firecrackers, etc)**

- **Legal fireworks remains on the ground and combusts include fountains, sparklers, ground spinners, and other fireworks with low pyrotechnic composition.**



*complying with the requirements of the United States Consumer Product Safety

Greeley Ordinances - Fireworks

- **Sec. 14-481 – Manufacture, sale, use or possession of fireworks**
 - **The fire department may adopt reasonable rules and regulations for the granting of permits for supervised public displays of fireworks and retail sale of fireworks within the city.**
 - **Permissible fireworks may be possessed, stored, sold, handled and used within the city by any individual age 16 years and older.**

Greeley Ordinance - Fireworks

- **Sec. 14-482 – Penalty**
 - **Any person who violates this chapter commits a misdemeanor infraction.**
- **Sec. 14-483 – Seizure of illegal fireworks**
 - **The police department or any city police officer shall seize, take, remove or cause to be removed, at the expense of the owner, all stocks of fireworks offered or exposed for sale or stored or held in violation of this chapter or of the adopted portions of the International Fire Code.**



Misdemeanor Charge
\$150 + \$30 surcharge = \$180 Fine

City of Greeley – Policy Number 78-4

- **Requirements for Fireworks Sales**
 - **Permit Application and Fee**
 - **\$1,500.00 / submitted 2 weeks prior to sales dates**
 - **Sales Dates – 2 full weeks leading up to the 4th of July holiday**
 - **2021 – June 25th – July 5th**
 - **Operating Hours – 8am to 10pm**
 - **Various safety, compliance and inspection procedures**

Fire Department

Number of Fireworks Stands in Greeley during the July 4th holiday

Year	Number of Fireworks Stands	Revenue (\$1,500.00/Stand)
2018	11 Stands	\$16,500.00
2019	10 Stands	\$15,000.00
2020	10 Stands	\$15,000.00
2021	7 Stands	\$10,500.00

FD conducted 6 random inspections and DFPC conducted 4 random inspections. No illegal fireworks were found in any stands in the City.



Calls for Service – Fire & EMS

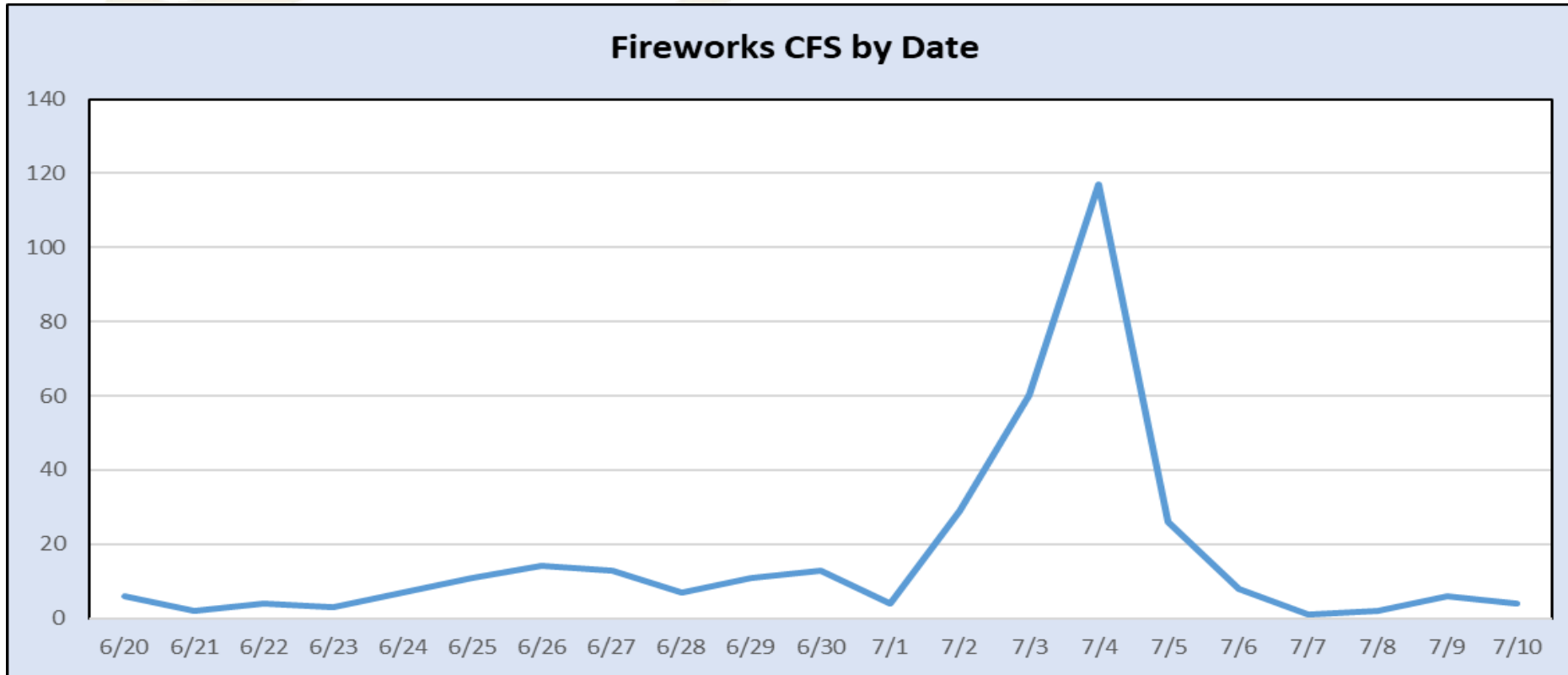
Number of calls for service between June 15 – July 15

Year	Number of calls for service	Fire related / EMS related	Number of fireworks related incidents
2018	1,194	unavailable	5
2019	1,221	38% / 62%	1
2020	1,134	24% / 76%	8
2021	1,403	25% / 75%	3

No significant increase in the number of calls noted when compared to any other 30-day time slice

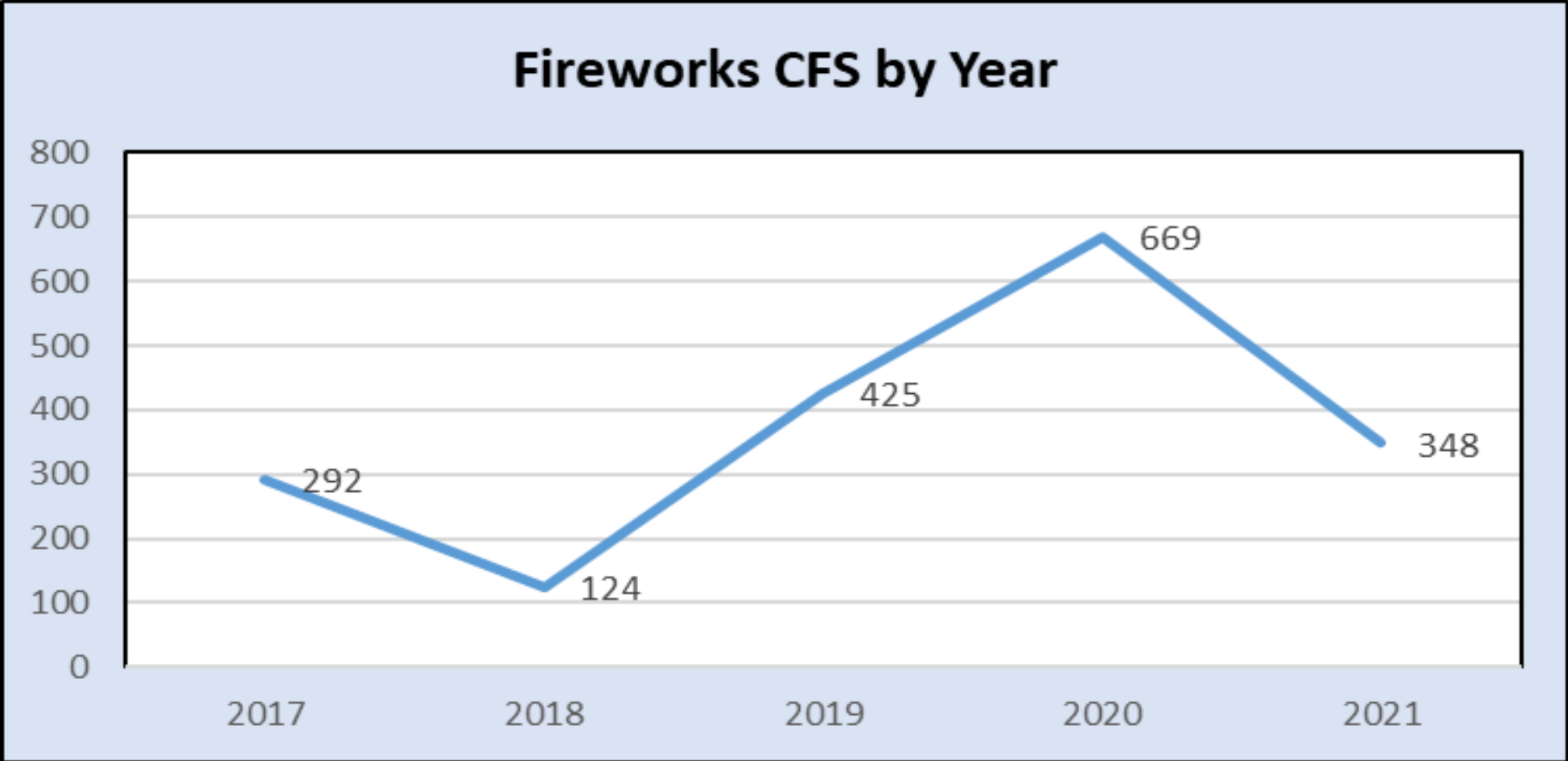


Police Calls for Service – Day of Week

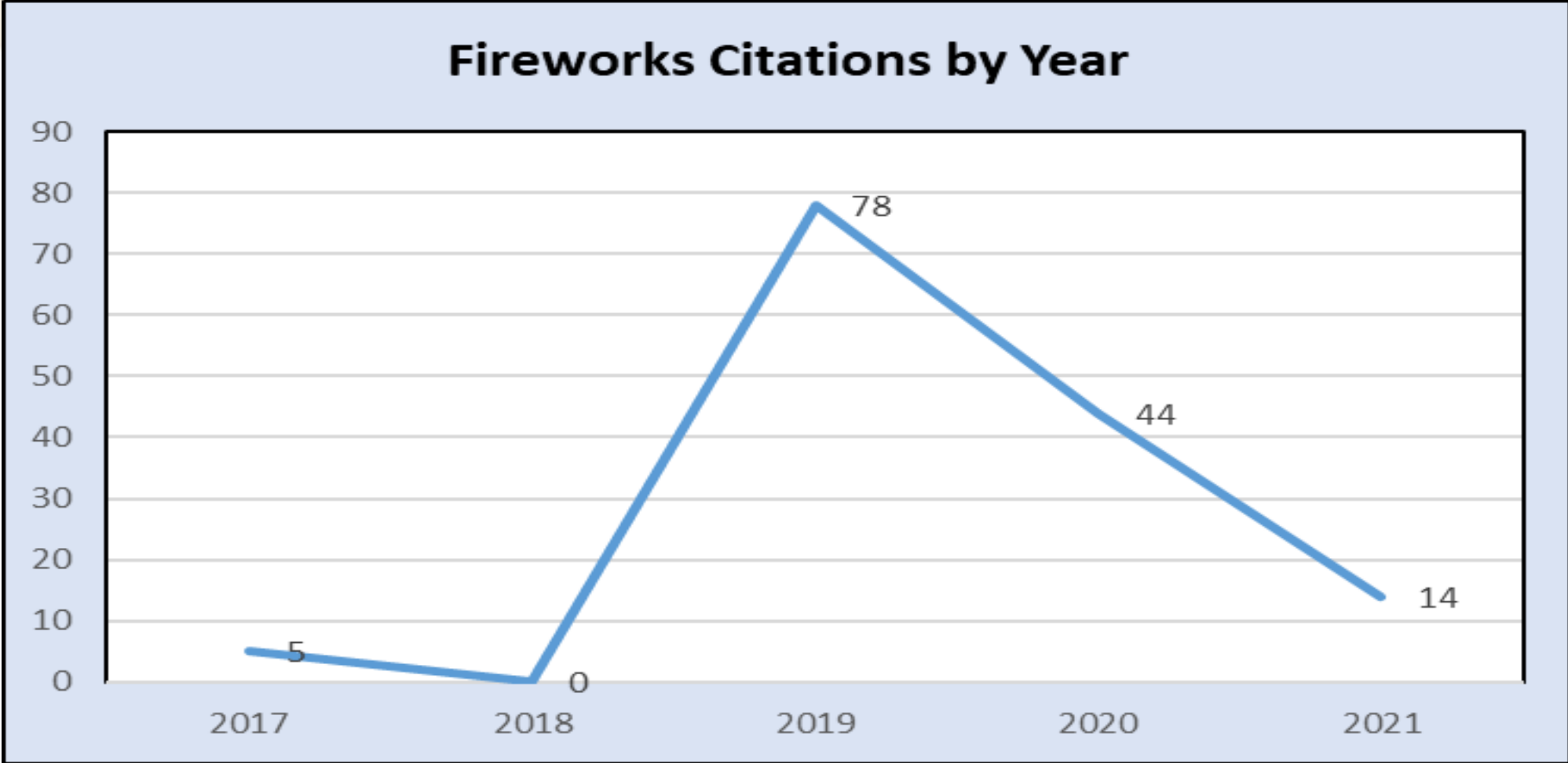


- **348 Total Firework Calls for Service (June 20 – 7/10)**
- **Majority of Calls for Service occur between the hours of 1900hrs - 0100hrs**

Police Calls for Service 5 Year Comparison



Police Fireworks Citations



Enforcement Challenges

- **Staffing**
- **Low-level crimes – prioritization of more serious calls**
- **Ability to cite individuals (Consideration of a Social Host Ordinance)**
- **Evidence collection**
- **Distinction between permissible fireworks and illegal fireworks**
- **Civil liability concerns (SB 217)**

Municipal Fines & Surcharge

City	Current Fines	Notes
Greeley	\$150 + \$30 surcharge = \$180	For subsequent violations, officer discretion to issue citation/fine or summons only into court
Ft. Collins	\$1,000-\$3,000	Summons only with possibility of up to 6 months in jail
Longmont	fines range up to \$999	Summons only with possibility of up to 18 months in jail
Loveland	\$1,000	If the defendant cannot pay immediately, sentenced to 3 days in county jail
Thornton	\$500-\$1,000	Summons only

Option 1 – No changes to ordinance

- **Permissible fireworks remain legal**
- **Update existing City policy pertaining to Requirements for Fireworks Sales**
- **Update application and permitting processes**
- **Enhanced public education safety campaign**

Option 2 – Modify Existing Ordinance

Permissible fireworks remain legal and changes to the existing ordinance:

- **Add dates and times that permissible fireworks are allowed to be sold and used in the City**
- **Include language that would allow the City Manager to ban the use of fireworks during times of extreme weather, drought, red flag warnings, etc.**
- **Increase penalty for violations with escalated fines for subsequent violations**
- **Consideration of a Social Host Ordinance**

Option 3 – Prohibit all Fireworks

- **Municipal Code Change**
 - **Prohibit the possession, manufacture, storage, sale and use of ALL fireworks in the City of Greeley.**
 - **Exception – public fireworks displays conducted by a certified fireworks display operator with the approval of the Fire Chief and Police Chief.**

Colorado cities that have enacted a similar ordinance

- **Arvada**
- **Boulder**
- **Colorado Springs**
- **Fort Collins**
- **Northglenn**
- **Thornton**






Questions?



2022



City of Greeley, CO

- 
- The Anderson Companies (Introduction)
 - About TNT Fireworks
 - Economic Impact
 - Fire Risk Analysis
 - Safety & Education

Executive Summary

THE *ANDERSON* COMPANIES

ANDERSON.
MEDIA CORPORATION



BAM!
BOOKS-A-MILLION

ANDERSON
PRESS

ANDERSON.
RESEARCH

ANCO
FAR EAST IMPORTERS, LTD.

AGP
AGRICULTURAL GROUP



FirstSouthern
BANK



nhc
Natural Healthy Concepts

BAMM.COM
BOOKS-A-MILLION.COM

AWBC
AMERICAN WOODWORKERS BROS. CO.

Whitman
Publishing, LLC

Professional
Supplement Center

core
Med Science

PGP
PREFERRED GROWTH PROPERTIES



FirstAssurance

OIAM



BookPage
AMERICA'S BOOK BUYER

H.E. Harris & Co.
Serving the Collector Since 1916

Mahogany Investments

Anderson & Anderson, LLC


Cypress Real Estate Companies

Elite-Medical, LLC

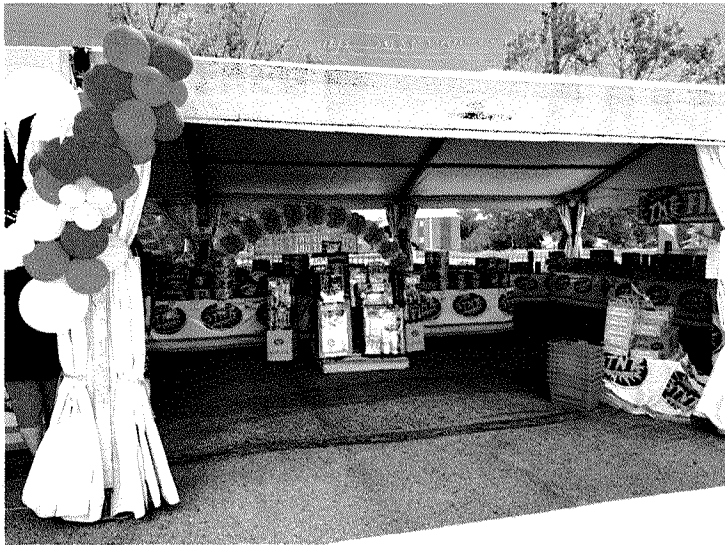
AGT Timber, LLC

Sweetwater Press

The Anderson Companies

- 
- TNT Fireworks is the largest distributor, most recognized, and the #1 Selling Brand of Consumer Fireworks in America.
 - TNT Fireworks' Mission is built in the belief that Commitment, Quality, and Teamwork are the keys to success with the most important goal of Safety and Customer Satisfaction.
 - TNT Fireworks has been in business for 102 years.

About TNT Fireworks



- TNT Fireworks has over 75 Seasonal Retail Locations across the state of CO
- 7 of which are located in Greeley
- Organizations that benefit from the sale of our products include Church/Religious Organizations, Non-Profit groups, For-Profit Individuals, School/Youth Groups, & Public Education groups such as:
 - High School Athletics
 - Band Boosters
 - Fire/Police Departments
 - Church Youth Groups
 - And more...

Fundraising Events

- TNT Fireworks supplies more than 500 retail stores in the State of Colorado.



Savings Made Simple



Retail Partners

- According to the National Fire Protection Association (NFPA), there were 1,338,500 fires reported in the U.S. during 2020. NFPA data estimates that 99.98% of these fires were caused by something **OTHER** than Fireworks.
- Recent studies conducted by the State Forrest Commissions and State Fire Marshal offices in prominently fire prone states show that Fireworks have **NOT** been identified as a significant cause of wildfires.
- Smoking, ATV use, and Agriculture Equipment (weed eaters, lawn tractors, etc.) have been extremely significant causes of wildfires.

Fire Risk Analysis

- TNT Fireworks' Commitment to Safety & Education is our highest priority ensuring that our products are used as intended; in a safe and responsible manner. TNT Fireworks continues to provide safety materials to our retailers and customers.
- TNT Fireworks' Consumer Safety Campaign extends to public safety officials, schools, and retailers through consumer-focused media outreach.
- All TNT Fireworks products meet or exceed the standards established by the U.S. Consumer Product Safety Commission (CPSC), Department of Transportation (DOT), and American Fireworks Standards Laboratory (AFSL).
- All TNT Fireworks products are third-party tested to ensure proper product safety, performance, and compliance by internationally recognized Bureau Veritas (BV).

TNT Fireworks Commitment

- Since 1976, when the U.S. Consumer Products Safety Commission promulgated the current federal standards for Consumer Fireworks, the Fireworks related injury rate has continued to decline. Fireworks usage has increased over 1,200% from 29 million pounds in 1976 to over 400 million pounds in 2020¹, whereas the injury rate has dramatically dropped from 38.3² injuries per 100,000 pounds to 3.86² injuries per 100,000 pounds of Fireworks.¹
- Currently, 49 States and the District of Columbia allow the use of some form of Consumer Fireworks, which equates to almost 98% of the U.S. population.

Safety & Education


¹ Summary of Trade and Tariff Information —Fireworks (TSUS Item 755.15), U. International Trade Commission, Washington, D.C.

² National Electronic Injury Surveillance System, U.S. Consumer Product Safety Commission, Washington, D.C.

- Each TNT Assortment & Product Bag features either Sensible Sam or Professor Sparks explaining safety information.
 - English and Spanish are available.
- All TNT Fireworks products are labeled with instructions of proper use and warning.




Safety & Education




Always have a sober adult in charge & never give fireworks to young children, even sparklers.



Only buy legal consumer fireworks from a licensed store, stand or tent. They typically have brightly colored labels with the manufacturer's name, directions and warnings.



Read and follow the directions on the labels.



Never carry a firework in your pocket or shoot fireworks from a metal or glass container.



Keep spectators at a safe distance.
Utilize bracing on aerial products to ensure stability.



Always wear safety glasses when igniting fireworks.



Celebrate Safely

Remember, even legal fireworks can cause injury if they're not used properly. Follow these rules to celebrate safely:

The American Pyrotechnics Safety & Education Foundation is a 501(c)(3) charitable organization focused on creating fireworks education & safety programs for youth.




Don't aim or throw fireworks at another person.



When finished, allow used fireworks to stand for at least 20 minutes, submerge in water, drain, place in a plastic bag & dispose outside in a covered trash can.



Never place any part of your body directly over a firework device.



Only use fireworks outdoors away from buildings on a flat, level, hard, fireproof surface that is free from debris.



Make sure there are no objects above a firework before lighting, and do not light on, or near, dry grass or vegetation.

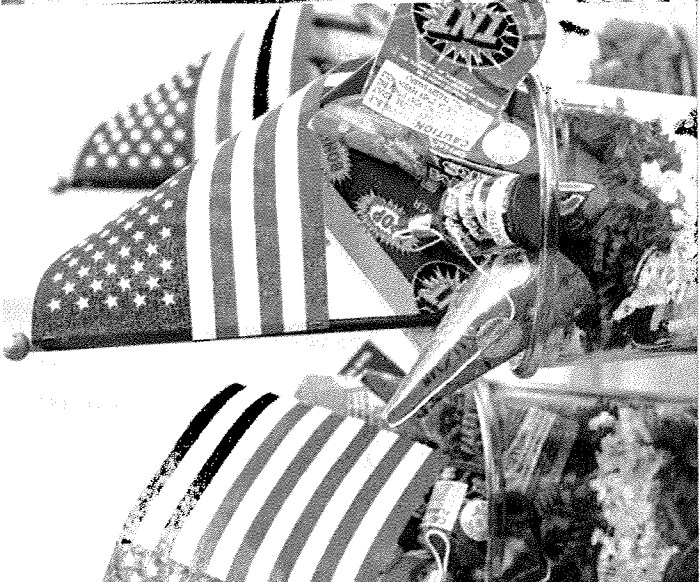
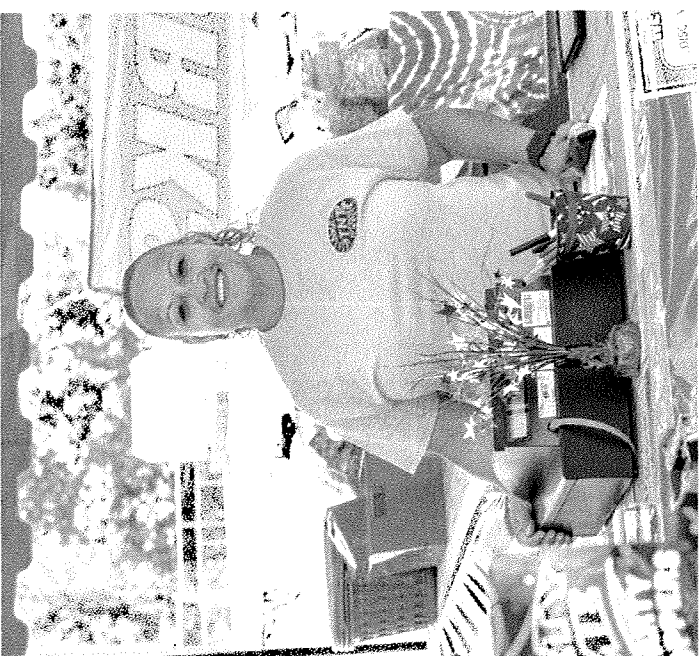


Have a working garden hose or bucket of water handy.



Light only one firework at a time and never approach or re-ignite a firework that doesn't light the first time.

Public Service Announcement (PSA)

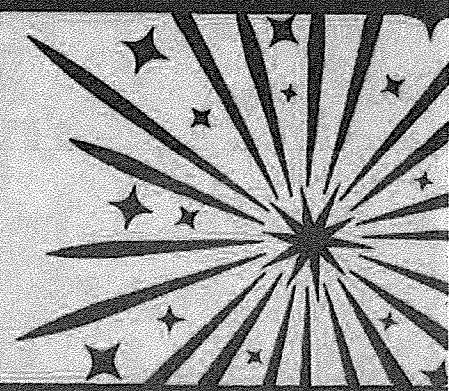


Thank You



FIREWORKS SAFETY STUDENT'S GUIDE

Grades 9th–12th



WWW.CELEBRATESAFELY.ORG

Fireworks Safety Elementary Book 2017

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Lesson 1

The History of Fireworks

Essential Standard

Explain the history of fireworks and how fireworks are used to celebrate holidays and events worldwide.

Learning Targets

You will be able to:

- discuss the history and development of fireworks in China;
- discuss the ingredients and their properties that make up the crude version of gunpowder;
- explain why hollow bamboo shoots when ignited produced a popping noise;
- explain how Chinese made bombs, fountains, and rockets; and
- list the different occasions that Americans use fireworks to celebrate.

Essential Vocabulary

Alchemy—a medieval chemical science that tried to change less valuable metals into gold, discover a single cure for all diseases, and discover how to live forever.

Black Powder— the explosive powder used in fireworks. It is made up of potassium nitrate, sulfur, and charcoal. This material can be used as a propellant charge, to produce sound, compositions, or in the ignition fuse or timing system of fireworks. Also known as gunpowder.

Elixir—a substance held to be capable of extending life.

Huo Yao—Chinese term for “Fire Drug” or gunpowder.

Multicultural—relating to or including many different cultures.

Saltpeter (potassium nitrate)—a white powder that exists naturally in some soils and that is used especially as a fertilizer, in medicine, and to make gunpowder.

Sulfur—a yellow chemical element that has a strong, unpleasant odor when it is burned and that is used in making paper, gunpowder, medicine, and other products.

How Are Fireworks Used?

The Chinese used fireworks to celebrate the most important events in life—a birth, a wedding, a death, holidays, and coronations.

The use of fireworks spread to Europe eventually first to celebrate military victories and later in public celebrations and religious ceremonies.

Legend has it that Captain John Smith set off the first fireworks display in the American colonies in Jamestown, Virginia in 1608. He and other settlers used the fireworks to celebrate special events.

Fireworks were used in the very first Fourth of July celebration in 1776.

Americans use fireworks year-round to celebrate national holidays, sporting events, and other multicultural events, but the “big day” is still the Fourth of July.



If you like fireworks, thank the Chinese!

Other countries have at least one big “fireworks day” like we do. In Germany, for example, it is New Year’s Eve, in France it is Bastille Day, and in England it is Guy Fawkes Day.

Assignments

Research and describe the properties of each: saltpeter (potassium nitrate), sulfur, and charcoal.

Write a summary describing a celebration that does not currently include fireworks that you believe would be enhanced by the addition of fireworks. Be certain to include the:

- name and importance of the event; and
- reasons why fireworks would improve the event.

Many historians believe that fireworks originally were developed in the second century B.C. in ancient Liuyang, China.

The first “firecrackers” were bamboo stalks that when thrown in a fire, would explode with a bang because of the overheating of the hollow air pockets in the bamboo.

The Chinese believed these natural “firecrackers” would ward off evil spirits.

According to legend, a Chinese alchemist mixed three ingredients, saltpeter, sulfur, and charcoal to produce a black, flaky powder.

The Chinese named this black powder “huo yao” which means “fire chemical.” We call it a crude version of gunpowder.

The Chinese then filled paper tubes with gunpowder and inserted fuses made from tissue paper to make firecrackers.

Another version of fireworks that the Chinese invented was called “ground rats,” which were small tubes filled with the fire chemical that scurried around the floor.

Eventually, the Chinese learned that you can make fireworks react differently depending on how you pack it:

- packing the gunpowder into containers with harder shells produced bombs;
- packing it into a cylinder with one side open produced sprays or fountains of fire and orange sparks; and
- packing the fire chemical in a larger tube, with one end left open, produced hot gas to propel it forward and upward, producing a rocket.

These are the same basic properties used today to create fireworks you see at big celebrations.

Lesson 2

The Safe Use of Fireworks

Essential Standard

Discuss the safe use of fireworks to avoid injury and damage to property.

Learning Targets

You will be able to:

- locate websites for the U.S. Consumer Product Safety Commission (CPSC), the Bureau of Alcohol, Tobacco, Firearms, and Explosives (ATF), the U.S. Department of Transportation (USDOT), and U.S. Customs and Border Protection (CBP);
- explain how fireworks are regulated by local, state, and federal governments;
- locate information on the internet about the regulation of fireworks in his/her state and city (if regulated by local government); and
- describe the safe way to use fireworks.

Essential Vocabulary

Consumer Fireworks—also known as 1.4G Fireworks. Fireworks that are manufactured and sold to individuals for their personal use and enjoyment. The definition of legal consumer fireworks varies from state to state. Examples are fountains, cones, and firecrackers.

Deflagrate—to burn, especially suddenly and violently.

Detonate—to explode or cause to explode.

Discharge Site—the area immediately surrounding the fireworks mortars, tubes, and cakes used for an outdoor fireworks display.

Display Fireworks (professional)—large fireworks also known as 1.3G Fireworks designed to produce visible or audible effects for entertainment purposes by combustion, deflagration, or detonation.

Dud—any device in which the fuse or igniter fails to ignite the main pyrotechnic charge.

Federal Government—a form of government in which power is shared between a central government and individual states or provinces.

Local Government—government of counties, cities, and towns comprised of locally elected political bodies; the administration of the local affairs of a city, town, or other district by its inhabitants.

Novelty—a device containing small amounts of pyrotechnic and/or explosive composition but does not fall under the category of consumer fireworks. Examples are snakes, poppers, and snappers.

Safety Glasses—eyeglasses worn to protect the eyes during a variety of tasks. They are made with shatter-resistant plastic lenses to protect the eye from flying debris.

State Government—a structure similar to the federal government, except on a much smaller scale. The states also have a power-sharing relationship with their local and municipal governments that's much the same as the federal system.

State-approved Fireworks—Forty-six of the 50 U.S. States and the District of Columbia allow legal "consumer" fireworks. The definition of consumer fireworks varies from state to state, but can include everything from cone fountains to roman candles to multiple tube "cake" devices to sparklers. Before using fireworks, find out what



is legal in your state by checking the state law summary for your state.

What Kinds Of Fireworks Are Legal In Your Community

Check with your local police or fire departments to learn what kinds of fireworks may be used in your community.

Legal fireworks are sold only at state approved stores or fireworks stands. Legal fireworks will have the manufacturer's name, directions, and warnings.

Illegal or homemade fireworks should never be used. Use of illegal or homemade fireworks can result in serious injuries or death to the user, unintended fires, and damage to property.

How To Use Legal Fireworks Safely

- Children should never use fireworks without adult supervision.
- Make sure children keep sparklers away from hair, face, and clothing.
- Sparklers that have bamboo sticks are cooler.

Alcohol and Fireworks Do Not Mix

The use of fireworks at holidays and other celebrations means that some adults may be drinking alcoholic beverages. Just like drinking and driving, drinking and fireworks do not mix.

Remind the adults in your home to never drink alcohol if they are setting off fireworks.

It's a great idea to have at least one "designated shooter" for the fireworks. Someone who agrees to abstain from any alcohol consumption prior to the fireworks activities.

DID YOU KNOW?

Even sparklers can reach 1,800° F (982°C). They should only be used outside and with close adult supervision.

Sparklers that have bamboo stems stay cooler than ones with metal stems.

- Always use fireworks outside and away from the house, on a hard flat level surface. This surface should be fireproof and free from leaves, grass, or other debris.
- Have a hose and bucket of water nearby when fireworks are being used.
- Light one firework at a time, and do not put the firework into any glass or metal container.
- Make sure all people in the area are aware that fireworks are being used.
- Keep spectators at a safe distance and point the fireworks away from people and homes.

Fireworks can catch a roof on fire if they land on it.

- Never hold any consumer firework in your hand or have your body over the firework while you are lighting it.
- Wear eye protection, such as safety glasses, while you are setting off the fireworks.
- Light one firework at a time.
- Never pick up a dud or relight a dud. Leave it lying on the ground, wait 15 minutes, and then douse it in a bucket of water.
- Never pick up used fireworks.

Used fireworks can be hot even if they are not smoldering.

- Douse all used fireworks and duds in a bucket of water before putting them in the trash.
- Have the fire department and emergency management system telephone number readily available before beginning to use fireworks.
- Have a first aid kit available should anyone get injured by using fireworks.

Be Considerate Of Your Neighbors

Sometimes fireworks can sound like a gunshot or explosions. And loud noises may be frightening to very young children, the elderly, or persons with certain disabilities.

Inform your neighbors that you will be setting off fireworks so that they will be prepared before you use fireworks in your neighborhood.

Pets And Animals Do Not Like Fireworks As Much As You Do

Pets and other animals have sensitive ears and could be frightened by the loud explosions from fireworks.

Keep pets away from fireworks and do not expose them to the loud noises of a fireworks display.

Pets can panic at the noises and bright flashes of lights causing them to run out of doors, jump from windows, break tethers, and leap fences.

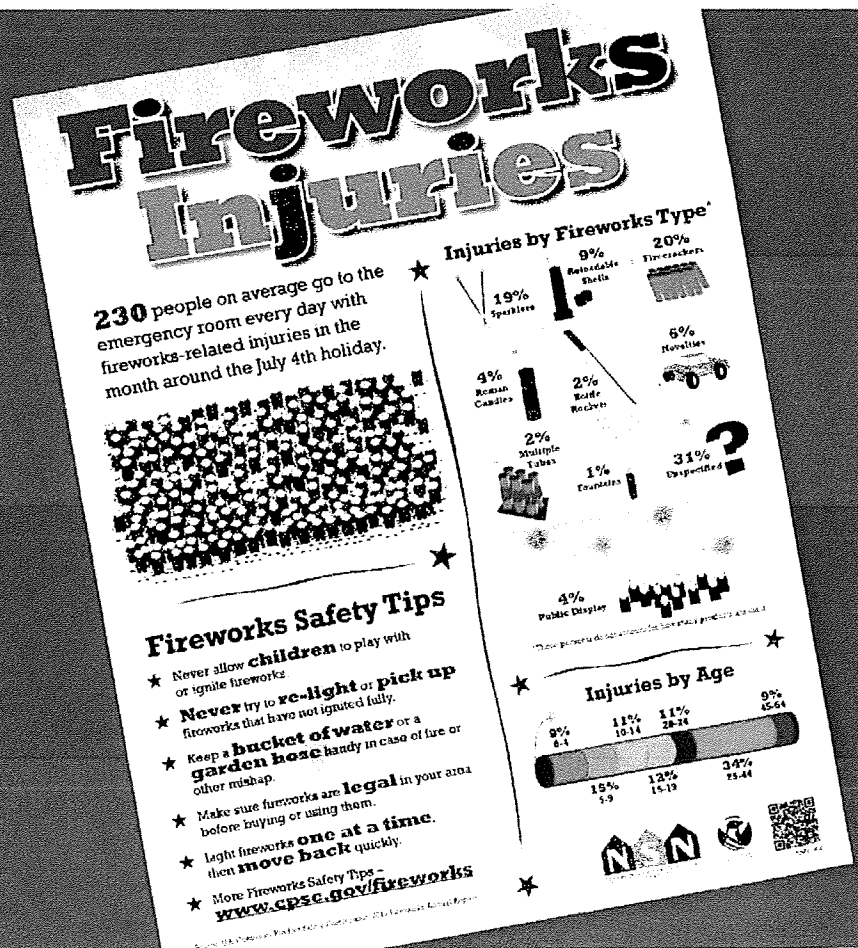
Pets should be kept inside so they do not run away, get lost, or get injured.

Assignments

1. Sketch a site plan for a consumer fireworks display indicating the safe distance measurements between each one of these locations. Include locations for the:

- discharge site within the display area;
- spectator viewing area;
- emergency site with necessary emergency items;
- vehicle parking and foot traffic; and
- any secured areas.

2. View the infographic available on the U.S. Consumer Product Safety Commission website at <http://onsafety.cpsc.gov/blog/2015/06/26/cpsc-science-fireworks-injuries-2015/>. Locate national fireworks injury data for your age group and design a poster to inform your peers.



Lesson 3

Illegal and Homemade Fireworks

Essential Standard

Discuss the concept of illegal and homemade fireworks for the purpose of avoiding the unintended consequences of these illegal explosive devices.

Learning Targets

You will be able to:

- locate websites for the U.S. Consumer Product Safety Commission (CPSC), the Bureau of Alcohol, Tobacco, Firearms, and Explosives (ATF), the U.S. Department of Transportation (USDOT), and U.S. Customs and Border Protection (CBP);
- explain the difference between legal, illegal, and homemade fireworks;
- locate examples of illegal fireworks on the websites of the U.S. Consumer Product Safety Commission (CPSC) and Bureau of Alcohol, Tobacco, Firearms & Explosives (ATF); and
- explain the indicators that a device may be illegal based on information provided by the ATF.

Essential Vocabulary

Consumer Fireworks — are legal fireworks that are manufactured and sold to individuals for their personal use and enjoyment.

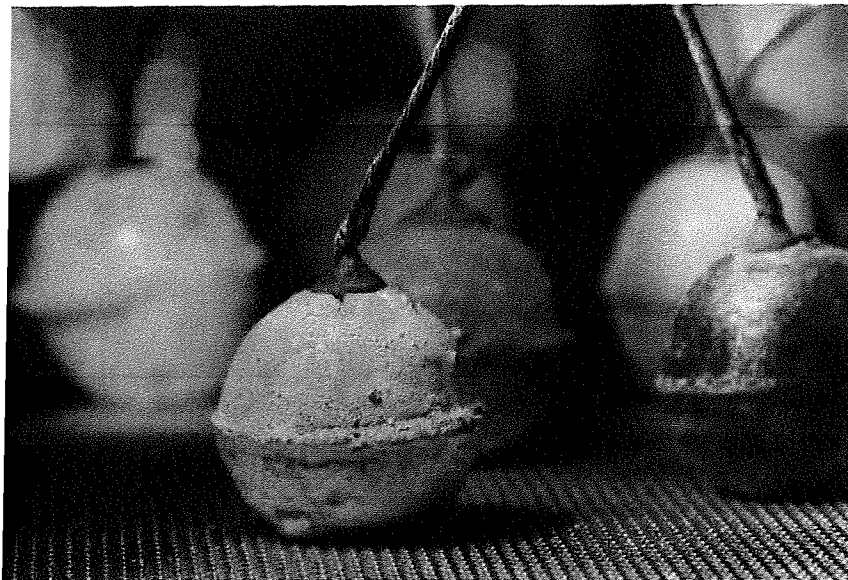
Explosive — (technical definition) any material that is capable of undergoing a self-contained and self-sustained exothermic chemical reaction at a rate that is sufficient to produce substantial pressures on their surroundings, thus causing physical damage. Explosives fall into two classes: detonating and deflagrating.

Federal Offense — any act that is performed in violation of the U.S. law. Such crimes are prosecuted in federal courts.

Illegal — prohibited by law or contrary to the law.

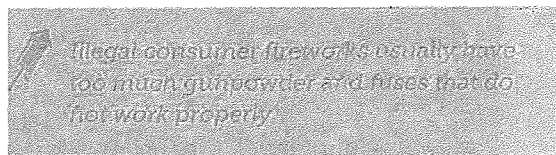
Illegal Fireworks — fireworks that are banned by the federal, state, or local government for use by consumers. Some examples include M-80s, M-100s, M-1000s, quarter sticks, silver salutes, sparkler bombs, and tennis ball bombs.

Legal — permitted by law or regulations.



What Are Illegal Consumer Fireworks?

Consumer fireworks that do not meet the requirements of the U.S. Consumer Product Safety Commission are illegal and dangerous.



Even if you use them correctly, illegal consumer fireworks can cause injuries and even death.

One way to tell if consumer fireworks are legal or illegal is to look for a warning label and the name of the manufacturer. Legal consumer fireworks have warning labels. Illegal consumer fireworks usually don't. Legal consumer fireworks have the name of the manufacturer. Illegal consumer fireworks usually don't.

All homemade consumer fireworks are illegal. People who make consumer fireworks at home are breaking the law. They are not trained to make fireworks. Many persons making homemade fireworks have been seriously injured, losing eyes, arms, legs, and even their lives.

Leave the manufacturing of all fireworks to the professionals!

What Are The Names of Some Illegal Consumer Fireworks?

- **M-80s, M-100s, M-1000s, Quarter Sticks, Silver Salutes**—tubes that are often red or silver in color, with a fuse and no manufacturer's identification or warning label. These devices contain large amounts of explosive powder, and they can go off as soon as the fuse is lit.
- **Cherry Bomb**—round devices, often red in color, with a fuse protruding from the sphere.
- **Tennis Ball Bomb**—improvised devices with explosive powder inside a tennis ball with a fuse.

It is also illegal to alter legal fireworks to make a more powerful explosive device by tying them together or packing them into a container.

How Can You Spot Illegal Consumer Fireworks?

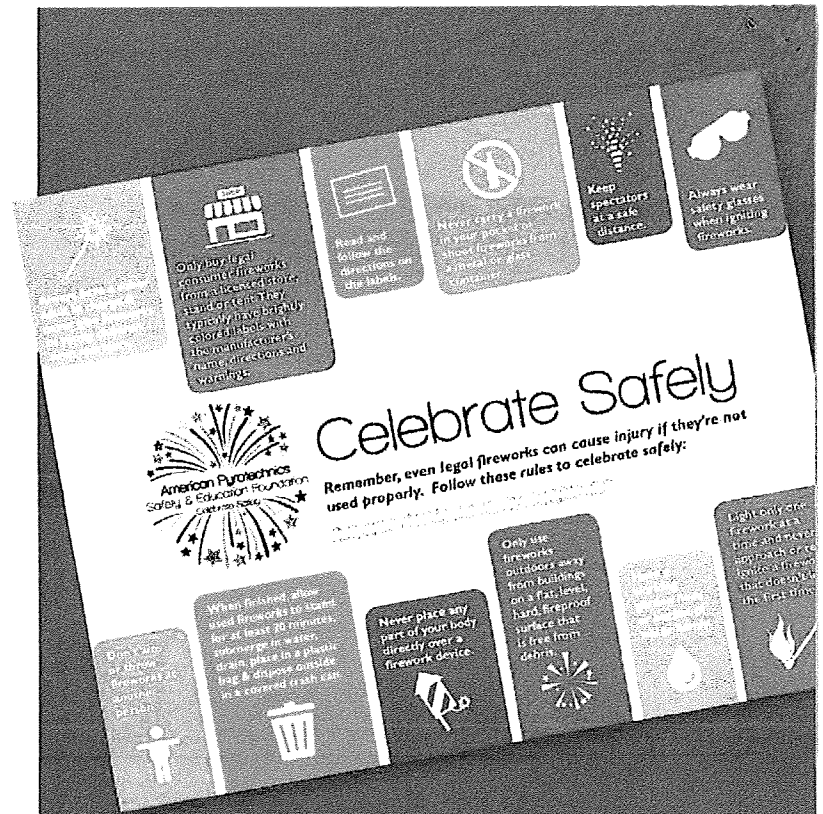
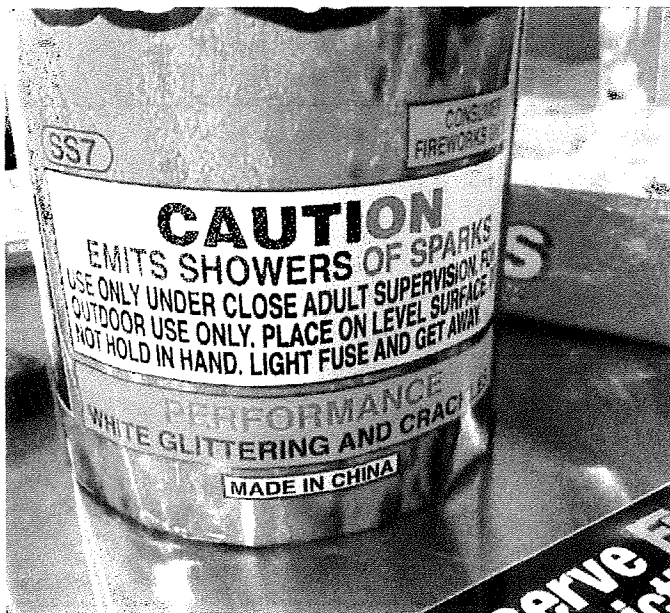
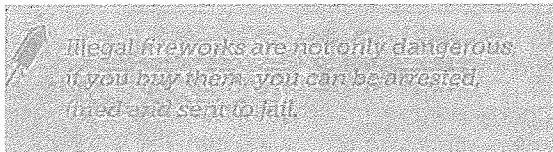
Consumer fireworks are probably illegal if:

- it resembles a roll of coins with a fuse out the top or side;
- it consists of a cardboard tube or oddly shaped item wrapped in brown paper and is filled with an explosive material;
- it is red, silver, or brown in color;
- it may be one to six inches long and up to an inch or more in diameter; and
- it is sold on the street or out of someone's vehicle.

How Can You Spot Legal Consumer Fireworks?

Fireworks are probably legal if:

- it has the name and place of business of the manufacturer, packer, distributor, or seller;
- it shows the name of the country in which it was manufactured;
- there are warning labels, prominently located on the front of the package, written in English; and
- it has the U.S. Department of Transportation designation: "DOT Consumer Fireworks 1.4G."



Assignments

1. Use the information found at the government websites provided below to create a chart to communicate the firework regulations enforced by each United States agency.

- Consumer Product Safety Commission
<http://www.cpsc.gov/>
- Bureau of Alcohol, Tobacco, Firearms, and Explosives
<http://www.atf.gov/>
- Department of Transportation
<http://www.dot.gov/>
- Customs and Border Protection
<http://www.cbp.gov/>

2. Invite a guest who has been personally involved with an illegal fireworks-related incident to share their experience with the class. For instance:

- an individual who has been injured or has experienced property damaged as a result of an illegal fireworks accident;
- a fire fighter, police officer, or medical provider who has provided rescue assistance to victims of an illegal fireworks accident; or
- a state or federal employee whose job responsibility is to stop the importation or making of illegal fireworks.

Rationale for a Fireworks Social Host Ordinance

Due to the increasingly high use of illegal fireworks on or about the 4th of July and New Year's Eve each year, and cities across the state being unsuccessful in holding users and possessors fully accountable for the possession and/or use of these dangerous illegal fireworks; an increasing number of cities, counties and fire districts are adopting "Fireworks Social Host Ordinances" in order to make owners, renters, leasees, and/or those that have possession of a residence or other property ("Responsible Person"), responsible for dangerous illegal fireworks possession and use on that property. Law enforcement and fire authorities in a jurisdiction only need to verify on what property the fireworks were launched or used. Once that is verified, the jurisdiction may pursue the "Responsible Person" for that jurisdiction's fine. In most instances, in general law cities, it is the maximum fine of \$1,000.

Both fire and police representatives will tell you that while the discharge of illegal fireworks can be tied to a particular residence or property, it is often difficult to tell who at the residence or property discharged the illegal fireworks. The owner or tenant of the premises is often in the best position to control and knows or should know of the possession, manufacture, storage, sale, handling and use of illegal fireworks on his/her residence or commercial premises. Many of these jurisdictions who have adopted social hosts ordinances have concluded that those persons who have possession or control of private property where dangerous illegal fireworks are being stored, sold or used, have failed to ensure that this activity is not taking place on their property.

In addition, many police and fire agencies are reluctant to send their personnel into an environment, particularly in the case of only one or two officers on the scene, that would pose a serious threat to that officer's safety given the participants in the illegal activity and the violator's level of intoxication or other impaired behavior. Thus, the ability to cite the "Responsible Person" without subjecting that officer to potential threat or harm, is a preferable, safer response to handling the situation.

Your jurisdiction should strongly consider adopting a Fireworks Social Host Ordinance and, like the vast majority of those who have Fireworks Social Host Ordinances, include a provision in the ordinance that, in addition to the Administrative Fine levied against the illegal fireworks violator, your jurisdiction could also recover "Response Costs".

How can TNT Fireworks Help You with YOUR Illegal Fireworks Issue?

For the past 100 years, TNT Fireworks has distinguished itself throughout the nation as a company that is committed to safety, quality and service, as well as supporting public safety agencies' efforts in those communities to combat the sale and use of illegal fireworks.



Recognizing that local jurisdictions have not only become the **"first line of defense"** but regrettably the **"only line of defense"** against illegal fireworks, TNT Fireworks has been partnering with cities, counties, and states in a joint effort to curb illegal fireworks. ([Click here to see why illegal fireworks problems keep getting worse.](#))



TNT Fireworks has developed several tools, that when used in conjunction with each other will have an impact on your community's illegal fireworks problem.

LOCAL PSA'S AND EDUCATION VIDEOS

TNT Fireworks has worked to create a variety of education materials to help educate the public about the safe and proper use of legal fireworks. Resources are also available to inform the public about the difference between Colorado legal-fireworks and illegal fireworks. These resources are available in print form, digital content and videos. TNT Fireworks can also hand out fliers to customers informing them of local PSA's.

([Click here for an example safety video.](#))

FIREWORKS SOCIAL HOST ORDINANCE

An increasing number of cities, counties and fire districts are adopting "Fireworks Social Host Ordinances" in order to make owners, renters, leasees, and/or those that have possession of a residence or other property ("Responsible Person"), responsible for dangerous illegal fireworks possession



and use on that property. Law enforcement and fire authorities in a jurisdiction only need to verify on what property the fireworks were launched or used. Once that is verified, the jurisdiction may pursue the "Responsible Person" for that jurisdiction's fine. In most instances, in general law cities, it is the maximum fine of \$1,000.

([Click here for rationale for and samples of Social Host Ordinances.](#))

RESPONSE COST RECOVERY ORDINANCE

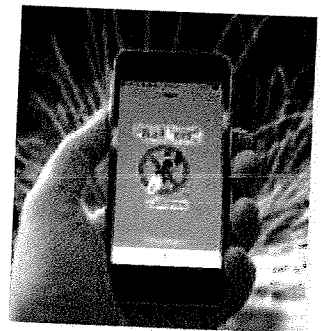
Response Cost Recovery Provision is a safety net to allow you to seize illegal fireworks and minimize your exposure



of being stuck with the costly disposal costs associated with them if the State fails to pick them up. ([Click here for rationale for and a sample Response Cost Recovery Ordinance.](#))

ILLEGAL FIREWORKS REPORTING SMARTPHONE APP – "NAIL'EM"

This new, unique smartphone app, appropriately named "Nail'em", places the power of illegal fireworks enforcement in the palm of your residents' hands. It allows them to easily report the possession, sale and use of illegal fireworks in your community along with photos and GPS locations.



When your jurisdiction fully participates with "Nail'em", the citizen's complaint is automatically routed to the correct law enforcement and/or fire personnel. Your jurisdiction can then follow up using their Social Host / Administrative Fine / Response Cost Recovery Ordinances.

Using this tool in conjunction with the others listed above will allow your jurisdiction to issue more citations/fines resulting in fewer people choosing to use and/or sell in illegal fireworks next year.

([Click here for more information on this amazing new free app and how you can get it for your jurisdiction.](#))

Enjoy Fireworks and the Fourth of July - But Stay Safe!

TNT® Fireworks is proud to partner with the City of Greeley leaders, Greeley Police, and Greeley Fire Department to share how residents can safely and legally enjoy celebrating this year's Fourth of July.

First, please remember to maintain social distancing and to only use legal, "Safe and Sane" fireworks while celebrating. Safe and Sane fireworks are those ground-based fireworks that do not contain either an aerial component or that explode. Residents are also encouraged to be particularly careful this season in selecting the location of their consumer display to help prevent unintended fire damage.

TNT® Fireworks also recommends that consumers follow the following safety tips when enjoying

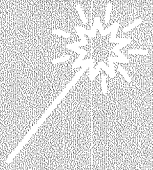
- Only buy and/or use legal fireworks from a licensed firework manufacturer.
- Read and follow the directions on the labels.
- Never give fireworks or sparklers to young children. It's illegal to purchase or possess a firework under the age of 16 in Colorado.
- Never use fireworks in conjunction with alcohol consumption.
- Only use consumer fireworks away from homes, buildings, and dry grass – and place them on a flat, level, hard, fireproof surface, such as concrete.
- Have a working water source nearby.
- Never carry a firework in your pocket or hold a lit firework in your hand.
- Never shoot fireworks from a metal or glass container
- Keep spectators at a safe distance and never aim or throw fireworks at another person.
- Always wear safety glasses when igniting fireworks.
- Never place any part of your body over a firework device – even when lighting.
- Light only one firework at a time.
- NEVER approach or try to re-ignite a firework that doesn't light the first time. Bring it back and TNT® will provide a free replacement.
- When finished, allow used fireworks to stand for at least 20 minutes, submerge in water, drain, place in a plastic bag and dispose outside in a covered trash can.
- Fireworks are noisy, so be respectful of those who have a sensitivity to loud or sudden noises, including pets, and especially those who have served our country in the military or as a first responder.



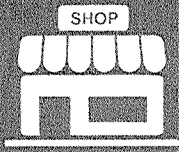
Sponsored by TNT® Fireworks

To access the full TNT® Fireworks Safety Tips and Discounts, please visit: <https://www.tntfireworks.com>

You can also report illegal fireworks by downloading TNT®'s "Nait'em" application.



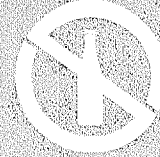
Always have a sober adult in charge & never give fireworks to young children, even sparklers.



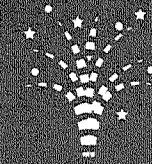
Only buy legal consumer fireworks from a licensed store, stand or tent. They typically have brightly colored labels with the manufacturer's name, directions and warnings.



Read and follow the directions on the labels.



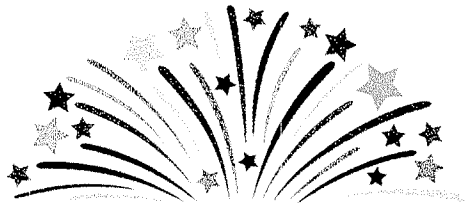
Never carry a firework in your pocket or shoot fireworks from a metal or glass container.



Keep spectators at a safe distance.



Always wear safety glasses when igniting fireworks.



American Pyrotechnics
Safety & Education Foundation

CELEBRATE SAFELY

Celebrate Safely

Remember, even legal fireworks can cause injury if they're not used properly. Follow these rules to celebrate safely:

The American Pyrotechnics Safety & Education Foundation is a 501(c) 3 charitable organization focused on creating fireworks education & safety programs for youth.

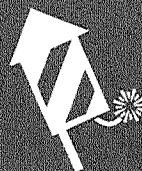
Don't aim or throw fireworks at another person.



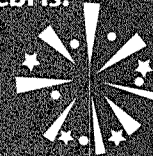
When finished, allow used fireworks to stand for at least 20 minutes, submerge in water, drain, place in a plastic bag & dispose outside in a covered trash can.



Never place any part of your body directly over a firework device.



Only use fireworks outdoors away from buildings on a flat, level, hard, fireproof surface that is free from debris.



Have a working garden hose or bucket of water handy.



Light only one firework at a time and never approach or re-ignite a firework that doesn't light the first time.

