GAME/ACTIVITY OUTDOORS STEM

## GAME ON: COLLABORATION AND COMMUNICATION

#### **AGES**

Tweens 9–12 Teens 13–18

#### PROGRAM DESCRIPTION

We have all heard the saying "Teamwork makes dreams work," but how can we effectively illustrate this concept for tweens or teens? With games! This program challenges teens and teens to work together, build on each other's strengths, and communicate effectively to win Survivor-style challenges. Run the games below, or come up with your own. Registration is helpful for knowing how many materials to have on hand. Suggested runtime: 45 minutes.

#### MATERIALS AND PREPARATION

#### **Helium Stick**

Materials:

• PVC pipe (one per team)

To play: Teams must lower a PVC pipe to the ground using only their fingers. The pipe must lie on top of the players' fingers and remain touching the entire time. Teams must start over if any player's finger is not touching the pipe. The first team to lower the pipe wins.

#### **Tennis Ball Transfer**

#### Materials:

- Tennis balls (one per team)
- Cups big enough to fit a tennis ball (one per team)
- Washers (one per team)
- String (one piece tied to the washer for each team member)

To play: Teams race to the location of the tennis balls and washers. Once all team members arrive, they transport their tennis ball on top of the washer using the strings attached to the washer. If the ball drops, they must start over. The first team to transport the tennis ball into the cup wins.

#### TIP:

Not everyone needs to participate in each game; as long as everyone gets to play at least one, teams can swap out players based on their skill sets.

#### TIP:

Divide teams by having them draw colors.

#### TIP:

For a similar activity that can be run as an icebreaker, see the Team Machine program on page 97.

#### TIP:

More about the helium stick game on Teampedia: https://bit. ly/3QdTcx2

#### **TEENS**

## GAME/ACTIVITY OUTDOORS STEM

#### **Blindfolded Puzzle**

#### Materials:

- Blindfolds (one per team)
- Colored bags
- Puzzle pieces for a whole puzzle (one per team)

To play: One player from each team is blindfolded and another directs the blindfolded player to gather the correct colored pages. Once all bags have been collected, the whole team opens the bags, pulls out the pieces, and solves the puzzle. The first team to solve the puzzle wins.

#### **Tower of Balloons**

#### Materials:

- A bag of balloons
- Masking tape
- Measuring tape

To play: Teams have 15 minutes to build the tallest tower of balloons. The balloons can be taped to one another but not to the ground. The team with the tallest tower wins.

#### Listen Well

#### Materials:

- White board and dry-erase markers
- Picture books, nursery rhymes, or short stories

To play: Players listen to a story. Afterwards, they answer multiple choice questions about that story. The team with the most correct answers wins.

## UNIQUE SPACE AND/OR PERSONNEL NEEDS

Solo-librarian friendly. Large space required. An additional staff member or volunteer for set-up or judging would be helpful.

#### TIP:

Buy latex-free balloons, or be sure to provide a latex allergy warning.

#### TIP:

For friendship fiction, see the Friendship Fiction Book List on page 44.



Image source: Shutterstock

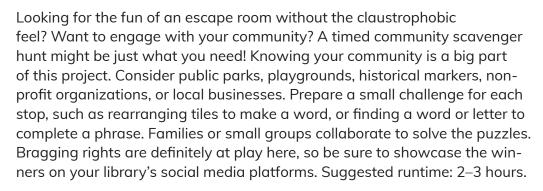
GAME/ACTIVITY | PASSIVE | OUTDOORS | LOW COST

## COMMUNITY PUZZLES SCAVENGER HUNT

#### **AGES**

Children 5–8 Tweens 9–12 Multigenerational

#### PROGRAM DESCRIPTION



Alternatively, run a similar scavenger hunt that lasts all summer. Businesses or service providers offer small prizes or stickers to those who stop by, and participants are entered for a prize at the end of the summer. Source larger gift donations from local businesses. You can keep the scavenger hunt the same all summer or put out a new version every month that features different community organizations.

#### MATERIALS AND PREPARATION

For the community-wide scavenger hunt:

- Bright laminated signs at each location (for the one-day version)
- Zip ties and/or tape (for the one-day version)
- Sidewalk chalk to mark path or obstacle course (for the one-day version)
- Printed maps of the entire area (draw your own or superimpose over Google maps)
- Pencils and printed instructions
- Prizes

For the library-specific scavenger hunt:

- Signs to mark each scavenger hunt location
- Printed library maps, with locations marked
- Pencils and printed instructions
- Prizes

#### Preparation:

Plan the stops and write the instructions. You can either outline the direct



Image source: Shutterstock

#### **ADAPTATION:**

You could also make a library-specific hunt to familiarize patrons with library resources, or link community resources to specific areas in the library (e.g., link the local history museum to nonfiction books on local history).

#### TIP:

The community-wide scavenger hunt is a great multigenerational program for families; the library-only adaptation is better for children who will be unaccompanied.

#### TIP:

To improve accessibility, be sure to include a variety of scavenger hunt items that patrons can smell, hear, and touch.

## GAME/ACTIVITY | PASSIVE | OUTDOORS | LOW COST

route or provide clues that participants need to figure out. If you want your event to seem more like a treasure hunt, clues are better than directions. Keep things as simple as possible. Make one sign for each stop. Create your map after you have decided on the stops.

Next, design activities and puzzles. For easy hunts, simply place one letter or word at each stop; participants gather them to complete a word, phrase, or sentence. You could also have them collect individual supplies for a craft project or science experiment (e.g., all the materials needed to make a beaded friendship bracelet).

Distribute signs for the community-wide option in advance, and be sure to touch base with all volunteers and partners the day before (and day of) the event.

#### UNIQUE SPACE AND/OR PERSONNEL NEEDS

For a day-long, community-wide event, you will need at least one volunteer at each station.

#### **RESOURCES**

#### Web

Scavenger hunt ideas from Good Housekeeping: https://bit.ly/3HdqEQc Scavenger hunt ideas from Scavenger Hunt: https://bit.ly/3mA51QL

#### Middle Grade Nonfiction

Code Cracking for Kids: Secret Communications Throughout History, with 21 Codes and Ciphers (2019) by Jean Daigneau

Karina Garcia's Next-Level DIY Slime (2018) by Karina Garcia

Spies, Code Breakers, and Secret Agents: A World War II Book for Kids (2020) by Carole P. Roman

The Ultimate Book of Scavenger Hunts: 42 Outdoor Adventures to Conquer with Your Family (2020) by Stacy Tornio

#### TIP:

Use Canva, Publisher, or your favorite design program to make the signs and/or maps. Vague maps can make the scavenger hunt more fun and challenging.

#### TIP:

Partner with Spanishlanguage agencies! This fun activity is perfect for outreach and community-building.

#### TIP:

Before the event, be sure to run it through with someone who did not write the instructions with you.

#### TIP:

Decide beforehand if you will collaborate with local businesses/ organizations or assign your own volunteers to each station. Teens and older tweens make perfect volunteers for activities like this.

#### TIP:

Be mindful of any dangers in your potential outdoor space. For example, if participants will need to cross a busy road, place a volunteer crossing guard. GAME/ACTIVITY | STEM | ARTS & CRAFTS | OUTSIDE PRESENTER | OUTDOORS

## FLOWER POWER

#### **AGES**

Children 5–8 Multigenerational

#### PROGRAM DESCRIPTION

Invite a local master gardener or extension office to teach kids about plants and flowers that grow in your area and their importance to the local wildlife or environment. Alternatively, partner with a community garden. After the speaker's presentation, pass out small clay pots for participants to decorate. Provide flower seeds of



Image source: Shutterstock

native plants or those that are beneficial to pollinators for children to take home and plant. If your library has the space, you could also do the planting inside. For a take-and-make program, provide kits with seeds, dirt in a plastic bag, and a pot. Also consider including a handout from your local extension office about local flora. Suggested runtime: 60–90 minutes.

#### MATERIALS AND PREPARATION

#### Materials:

- Small clay flowerpots (4-inches wide)
- Acrylic paint and paint brushes, or paint pens/sharpies
- Clear coat spray paint (optional)
- Flower seeds (milkweed or another pollinator seed mix)
- Potting soil
- Tablecloth or tarp for covering workspace

#### UNIQUE SPACE AND/OR PERSONNEL NEEDS

Depending on the type of art materials, this program may be best done outdoors.

#### **RESOURCES**

#### Web

Pots out of Play-doh containers from Projects with Kids: https://bit.ly/3xR-3JHt

"Pollinators" from The National Wildlife Foundation: https://bit.ly/3mSuuok

#### TIP:

Make a book display for books on gardening, habitats, flowers, insects.

#### **ADAPTATION:**

If you are creating a community garden at the library, be sure to include raised boxes for accessibility.

#### **ADAPTATION:**

You could also make a seed library for patrons to share seeds from home. Enlist teens to help organize the seeds

#### **ADAPTATION:**

Teach teens how to build their own window boxes or raised beds at home. Invite a guest speaker to demonstrate, and send teens home with printed instructions for window boxes, such as those available from My Outdoor Plans: https://bit.ly/3NSAZ6G

#### **ADAPTATION:**

If your library has a terrace, patio, or garden space, you could also do this as a small flower garden program. Children learn from a local farmer or gardener, then plant flowers; they sign up to be "gardener of the week" throughout the summer to care for the communal garden.

### GAME/ACTIVITY | STEM | ARTS & CRAFTS | OUTSIDE PRESENTER | OUTDOORS

#### **Books**

1001 Bees (2021) by Joanna Rzezak (picture book)

The Bee Book (2018) by Charlotte Milner (picture book/early reader)

The Extraordinary Gardener (2018) by Sam Bougton (picture book)

Forest Magic: A Guidebook for Little Woodland Explorers (2021) by Sarah Grindler (picture book)

Garden Day! (Step into Reading 1) (2019) by Candice Ransom and illustrated by Erika Meza (picture book/early reader)

I Have the Right to Save My Planet (2021) by Alain Serres, illustrated by Aurélia Fronty, and translated by Shelley Tanaka (picture book)

Miguel's Community Garden (2022) by JaNay Brown-Wood and illustrated by Samara Hardy (picture book)

Tokyo Digs a Garden (2016) by Jon-Erik Lappano and illustrated by Kellen Hatanaka (picture book)

Yasmin the Gardener (2021) by Saadia Faruqi and illustrated by Hatem Aly (early reader

#### TIP:

Free pollinator seeds are available from www. saveourmonarchs.org GAME/ACTIVITY OUTDOORS LOW COST

## LIBRARY FIELD DAY

#### **AGES**

Children 5–8 Tweens 9–12

#### PROGRAM DESCRIPTION

Get your sneakers and celebrate summer with an old-fashioned field day! Full of cooperative relay races, obstacle courses, and other games, a day of play encourages imagination, confidence, coordination, and social-emotional intelligence. These 8 physical activities require players to work together towards a common goal; they are fun ways to illustrate kindness, fairness, and critical thinking. When planning a field day, be sure to select a mix of activities that use different muscles and skills. For an art activity idea, see The More We Paint Together on page 148, which could be adapted to a field day station. Suggested runtime: 60 minutes.



#### For hula hoop hustle

- You will need one hula hoop per group.
- Divide children into groups of five or six.
- Have each group stand in a line or circle holding hands.
- Loop a hula hoop over the first player's arm. The players must pass the hula hoop down the line without letting go of each other's hands, such as maneuvering the hula hoop over their heads or under their feet.
- Whichever group can pass the hula hoop first without breaking their chain is the winner.

#### For human knots

- Divide children into groups of 10.
- Have each group form a circle.
- Tell the players to raise their right hand and grab the hand of someone across the circle from them. Repeat with the left hand. Make sure that no one is holding hands with someone directly beside them, and that everyone is holding two different hands.
- The players attempt to untangle themselves to form a circle again without letting go of each other's hands.
- You can allocate a specific time players have to complete the challenge or simply see how long it takes them to finish.

#### For egg toss

You will need one egg per pair



Image source: Shutterstock

## GAME/ACTIVITY OUTDOORS LOW COST

- Divide children into pairs and have them face each other.
- Give each pair an egg.
- The player holding the egg must lightly toss it to the other team member. Once caught, they both take one step backward and toss the egg again.
- The pair that tosses their egg the farthest apart without breaking it win.
- If the egg drops but does not break, the pair is still in the game.

#### For water relay

- Place two buckets full of water and two sponges at the starting line.
- Place two smaller empty buckets at the finish line.
- Divide children into two groups of five.
- When the relay begins, the first player from each team dunks the sponge into the water bucket and runs to the empty bucket to squeeze the sponge into the empty bucket.
- The first player then runs back to the starting line, and the relay repeats with the next player.
- Whoever fills the empty buckets with water first wins.

#### For mummy relay

- You will need one roll of toilet paper per group.
- Divide children into groups of five; designate one as the "mummy"
- The mummy stands with arms outstretched and legs apart.
- Team members take timed turns wrapping the mummy.
- First mummy to be fully wrapped is the winner.

#### For drop and pop

- You will need five balloons and one chair per group
- Set up a chair for each team at a destination point.
- Divide children into groups of five. Provide each player with an inflated balloon or water balloon.
- When the relay begins, the first team members run their balloon to the chair, drop the balloon, and then sit on the it until it pops.
- After it pops, the players runs back to their team and tags the next player.
- The relay continues until the last player in each team has made it back to their group line.
- The first group to finish wins.

#### For balloon volleyball

- You will need one balloon, and crepe paper or yarn to serve as the "net." One pool noodle per child is optional.
- Attach streamers between two chairs, pillars, or trees to create your volleyball net.
- Divide children into two teams of six.
- Arrange each team in two lines of three on either side of the net.
- Choose a team to serve. The server takes their shot from the second line behind the net and may serve underhand or overhand.

#### TIP:

The eggs can also be replaced with water balloons.

#### TIP:

For a refreshing water relay on a hot day, require players to carry their wet sponges over their heads.

#### TIP:

To save time, inflate (or fill) balloons before the program. Consider an air (not helium) balloon pump if you will run this activity with several groups.

#### TIP:

Be mindful of latex allergies. Have a latex warning for parents, or buy latex-free balloons.

## GAME/ACTIVITY OUTDOORS LOW COST

- Teams pass the balloon back and forth with their hands (or pool noodles).
- If the balloon touches the ground, the opposing team wins a point and the next serve.
- The first team to 10 points wins.

#### For crab walk soccer

- You will need one foam sports ball or beach ball and masking tape or string for the goal line.
- Divide children into two teams of five to eight players.
- Assign players numbers (each number should be assigned to two players)
- Place the ball in the middle of the play space and call out a number.
- The two players with that number go to the center and attempt to get the ball over the opposing team's goal line.
- Players walk like a crab during the duration of the game; hands and feet must be touching the ground, with stomachs aimed toward the ceiling.
- Players may only touch the ball with their feet or head (no hands!) Team members may assist in scoring or defending, but the player with the called number must be the one to score.
- When a goal is scored, return the ball to the center of the play space and call out another number.
- The first team to 10 points wins.

#### UNIQUE SPACE AND/OR PERSONNEL NEEDS

If your library does not have outdoor space, consider other green spaces in your community, such as parks and schools. To run these games concurrently, you will need a large group of volunteers. Older tweens and teens make great helpers in planning and executing this program.

#### **RESOURCES**

#### Web

Action for Healthy Kids blog: https://bit.ly/30ifb4j More cooperative games from Playworks: https://bit.ly/3HryTZc 40 games from ABCDee Learning: https://bit.ly/3aUnpRv

#### **Books**

#### Field Day Nonfiction

101 Things for Kids to Do Screen-Free (2020) by Dawn Isaac (middle grade) Backyard Adventure (2019) by Amanda Thomsen (middle grade) Come Out and Play: A Global Journey (2020) by Maya Ajmera and John D. Ivanko (picture book)

Everyone Wins! Cooperative Games and Activities for All Ages, 3rd ed. (2019) by Ba Luvmore and Josette Luvmour (middle grade)

#### Field Day Fiction

A Feel Better Book for Little Sports (2021) by Leah Bowen and Holly Brochmann, and illustrated by Shirley Ng-Benitez (picture book)

#### TIP:

For additional fun, have children vs. librarians, vs. siblings, or vs. their parents.

#### TIP:

If using pool noodles, cut them in half before the program.

#### TIP:

Have extra balloons on hand in case your "volleyball" pops.

#### TIP:

If any families include a person in a wheelchair, ensure that there are suitable wheelchair spots near every activity.

#### CHILDREN

#### **TWEENS**

## GAME/ACTIVITY OUTDOORS LOW COST

Go, Team, Go! (Step into Reading 2) (2021) by Tennant Redbank (early reader)

My Weird School: Teamwork Trouble (I Can Read Level 2) (2020) by Dan Guteman and illustrated by Jim Paillot (early reader)

Racing the Waves (Ready to Read Level 1) (2019) by Jane Yolen and illustrated by Mike Moran (early reader)

Rocking Field Day (Pete the Cat Level 1) (2021) by Kimberly Dean and James Dean (early reader) Splat the Cat and the Obstacle Course (I Can Read Level 2) (2021) by Rob Scotton (early reader) Team Up: El Toro and Friends series (2021–22) by Raúl the Third and illustrated by Elaine Bay (early reader; English with Spanish words)

## GAME/ACTIVITY ARTS & CRAFTS OUTDOORS LOW COST

## LARP AT THE LIBRARY

#### **AGES**

Teens 13-18

#### PROGRAM DESCRIPTION

Teens collaborate through live action role play (LARP)! Announce a theme beforehand and encourage teens to attend dressed for role play. Work on character development, combat practice, and prop creation before the role-playing begins. This program may need volunteers for non-player characters (NPCs) to provide obstacles during gameplay. It can be run as a day-long event or broken into a series. Suggested runtime for a day-long event: 4–7 hours (1–2 for character design, 1–2 for prop construction, 1 hour for stage combat practice, 1–2 hours for gameplay).

#### MATERIALS AND PREPARATION

Preparation:

- Gather craft supplies such as pool noodles, recyclables, paint, duct tape, scissors, etc.
- Design or choose the scenario for gameplay.
- Modify the scenario for age-appropriateness if necessary.
- Hold a mini meeting with volunteer NPCs before gameplay.

First, help them design their characters. You could use a basic D&D character sheet, create a simpler character design page for your themed activity, or premake gender-neutral characters to select from). Share YouTube videos of how to perform basic stage combat and let them practice outside. Then provide art supplies or recycled materials for them to craft props of their choosing. Once their props are complete, read the scenario for teens to work through together.

#### UNIQUE SPACE AND PERSONNEL NEEDS

You will need a large program (or outdoor) space with tables and chairs. You may also need extra staff members or volunteer NPCs.

#### **RESOURCES**

#### Web

Free LARP scenarios wiki: https://bit.ly/3zBnT9s Free character sheet from D&D 5e Character Sheet: https://bit.ly/3mLlAJh

#### **Books**

The Adventure Zone series (2018–21) by Clint McElroy et al. (YA F) Don't Read the Comments (2020) by Eric Smith (YA F)

#### TIP:

If someone in your community knows basic stage combat, ask them to present and/or assist.

#### ADAPTATION:

Character design, stage combat practice, and prop creation are easily be adapted to virtual programs. Gameplay would a little less interactive, but teens can still work together to problem solve.

#### TIP:

If you adapt this program for tweens or families, teens make great volunteer NPCs.

#### **TEENS**

## GAME/ACTIVITY ARTS & CRAFTS OUTDOORS LOW COST

Even If We Break (2020) by Marieke Nijkamp (YAF)

Glitch Kingdom (2020) by Sheena Boekweg (YA F)

In the Hall with the Knife series (2019–21) by Diana Peterfreund (YA F)

The Inheritance Games series (2020–22) by Jennifer Lynn Barnes (YA F)

The Life and Medieval Times of Kit Sweetly (2020) by Jamie Pacton (YA F)

The Perfect Escape (2020) by Suzanne Park (YAF)

Power Play: How Video Games Can Save the World (2017) by Asi Burak and Laura Parker (adult NF)

Slay (2019) by Brittney Morris (YA F)

Truly Devious series (2018–21) by Maureen Johnson (YA F)

GAME/ACTIVITY DECORATION/DISPLAY OUTDOORS LOW COST

## CHALK THE BLOCK WITH KINDNESS

#### **AGES**

Multigenerational

#### PROGRAM DESCRIPTION

Over the course of one day (or several days), invite families to create sidewalk chalk with messages encouraging kindness. Stick to a small area or expand throughout your town or neighborhood. When possible, aim for tie-ins with other community and/or school events and festivals. Distribute kits containing sidewalk chalk, ideas, and a map, and follow up by photographing the sidewalk chalk art and sharing it on social media or in library displays. This also works great with rainbow chalk for



Image source: Shutterstock

Pride in June! See below for a recipe to make chalk yourself (or turn this into a two-part program by making the chalk together). Suggested runtime: 90–120 minutes.

#### MATERIALS AND PREPARATION

Materials for the day of the event:

- Sidewalk chalk
- Templates/stencils (optional)
- Maps of preapproved areas for chalk art
- Handouts with message ideas and tips

#### Preparation:

- Contact local businesses and organizations to get approval for chalk art in front of their buildings.
- Put approved sidewalk chalk locations on a map.
- Print maps and handouts for participants.
- Source lots of chalk (or let participants make it).

Materials for making sidewalk chalk:

- Warm water
- Plaster of Paris
- Tempura paint or food coloring
- Toilet paper or paper towel rolls, or silicon molds
- Disposable masks

#### TIP:

Be sure to monitor the weather and reschedule as necessary. Be sure to check in with local business owners before the program to approve messages that might appear in front of their place of business.

#### TIP:

Consider partnering with schools, local chamber of commerce, parks department, daycares, or Spanishlanguage organizations.

#### TIP:

For a virtual program, participants brainstorm messages to write on Post-it notes, then stick them all over town.

#### **ADAPTATION:**

Make this a two-part program: Before hitting the streets, participants make their own chalk using plaster of Paris and toilet paper rolls.

#### TIP:

Make the library the ending location, and gather everyone for treats!

#### TIP:

If your map has participants cross busy streets, enlist volunteer crossing guards to help families across.

#### **MULTIGENERATIONAL**

### GAME/ACTIVITY DECORATION/DISPLAY OUTDOORS LOW COST

- Paper towels (for cleanup)
- Plastic bags for covering tables (optional)

#### Assembly:

- Mix 3 cups plaster of Paris with 1.5 cups warm water, and stir.
- Add tempura paint or food coloring, and stir.
- Spoon mixture into toilet paper rolls, wiping off any drips.
- Let chalk dry for 24 hours before peeling off paper rolls.

#### UNIQUE SPACE AND/OR PERSONNEL NEEDS

Solo-librarian friendly if the event is held in a contained area with little-to-no traffic. Volunteers would be helpful to photograph chalk art and to monitor safety during larger events.

#### RESOURCES

#### Web

Sidewalk chalk tutorial from Craft Warehouse: https://bit.ly/3xQrY8v Tips for chalk art festival from Lasso the Moon: https://bit.ly/3NQR1Od Chalk art (grid method) from Chalk Artists Guild: https://bit.ly/3mO3g2w Tips for neighborhood chalk art from Learn with Mochi: https://bit.ly/3MP-JYEb

"Sidewalk Chalk Art Tutorial: Elephant" [2 min] from STL ZooTube on YouTube: https://bit.ly/3aXGCBU

"Chalk the Walk" from the ALSC Blog: https://bit.ly/30qYwy4

#### **Books**

The Case of the Missing Chalk Drawings (2018) by Richard Byrne (picture book F)

The Chalk Art Handbook (2021) by David Zinn (middle grade NF)
The Chalk Giraffe (2020) by Kirsty Paxton and illustrated by Megan Lotter
(picture book F)

#### **Printables**

Kind Message Ideas (in English and Spanish)

#### TIP:

During the program, be sure to have staff members or volunteers document the art, which you can then share on social media or in the library!

#### TIP:

Remember disposable masks! Plaster of Paris is non-toxic, but the dust can irritate lungs.

#### TIP:

Work quickly. Plaster starts to dry in 20–30 minutes.

#### TIP:

For kindness books, see the Kindness Book List on page 186.

# KIND MESSAGE IDEAS / IDEAS DE MENSAJES AMABLES

ENGLISH	SPANISH
Dream big!	¡Sueña en grande!
Shine bright.	Brilla.
Believe in yourself.	Cree en ti.
Be the change	Sé tú el cambio.
You've got this.	Puedes hacerlo.
Never stop learning	Nunca dejes de aprender.
It gets better.	Se pone cada vez mejor.
Aspire to inspire.	Aspira a inspirar.
You rock!	¡Eres lo máximo!
Follow your dreams.	Sigue tus sueños.
Make today amazing	Haz de hoy un día especial.
Stay true to you.	Sé fiel a ti.
Never give up	Nunca te rindas.
Never stop learning	Nunca dejes de aprender.
It's cool to be kind.	Es genial ser amable.
You make the world a better place.	Haces del mundo un lugar mejor.
We're all in this together.	Estamos todos juntos en esto.
Be a rainbow to someone's cloud.	Sé el arcoíris de las nubes grises de
Every day is another chance.	Cada día es otra oportunidad.