

Blast off on an intergalactic adventure and get hands-on with space exploration. Rolling and stamping with the rollers to create beautifully detailed and tactile space scenes will stimulate children's curiosity, extend their understanding of our world and beyond, and develop important fine motor skills.

On a roll

Children will enjoy trying out the rollers independently, but guiding them through the early stages will help them get to grips with them:

- The easiest way to use a roller is to roll it away from you. Afterwards, if the scene is facing sideways, simply turn the piece of dough round so the scene faces the child. They can then use the stamp at the end of the roller to complete the picture.
- The next step is learning to roll across the body. As well as encouraging children to apply equal pressure laterally, this action will challenge them to cross the midline and develop motor skills important for learning to write.



- Talk about how hard the child has to press down with the roller to make the scene come out well. What happens to the details in the scene when they press harder or more gently?
- What does the picture feel like when they run their finger over it?
- Explore using the rollers with different substrates, such as clay, kinetic sand, sand dough or cloud dough. This will encourage children to adapt their rolling technique, pressing harder when necessary and developing their motor skills.

Space talk

Many children are fascinated by space exploration and other planets. As you talk about the designs the children roll, allow them to be the experts and share what they already know, asking questions to open up new avenues for discussion:

- What have you seen in the sky at night? What gives us light on planet Earth? Do you know the name of any other planets?
- What equipment do we use to see other planets and other objects in space more clearly from Earth?
- How is Earth different to other planets? What do we have on planet Earth that we need in order to live?
- What do you call someone who travels into space? Why do astronauts need spacesuits and helmets?
- What would it be like to walk on the moon? Some people had the opportunity to land on the moon – find out more about who they were and what they did. How did they get there, what did they use to travel while they were on the moon and what did they bring back with them? How were their spacecrafts different to the ones astronauts use today?
- Some astronauts are travelling around Earth on the International Space Station – show some photos taken from the ISS and talk about what they show. What would it be like to do a spacewalk on the ISS?



- Find out more about how looking at the Earth from space helps us to understand more about our planet. To help children understand this, you might like to look at pictures of weather patterns, polar regions, mountains, rivers, forests and coral reefs.
- Make up stories together about travelling into space or walking on the moon.

Out of this world

A space theme is ideal for role play as astronauts:

- Create a rocket from junk modelling materials – cover it with coloured paper or paint, cut out windows so the astronauts can observe the Earth, and add control consoles inside with lids for buttons and dials.
- You might like to add a lunar landscape for your rocket to land on – this could be as simple as taping together large pieces of grey paper and drawing on craters.
- Your astronauts will need helmets to survive in space – these could be made from cardboard boxes or paper bags, covered in silver foil with a hole cut out at the front.
- When your rocket blasts off into space, other children could sit at a mission control desk with another control console, counting down to lift off and speaking to the astronauts via radio.
- When your astronauts have returned from space, they could share their discoveries and talk about what they saw.
- For space play on a smaller scale, create a small world lunar landscape using grey dough or gravel, and add a homemade rocket and astronauts (figures of people, wrapped in tin foil).



Space crafts

As well as a rocket for role play, the rollers could inspire other creative activities:



- Make your own solar system – this could be a simple 2D design using cut out painted circles for the sun and planets, or even a 3D version that can be hung from the ceiling. To create the colourful patterns of Jupiter and other planets, you might like to do some marble painting (rolling marbles covered in wet paint around over paper in a tray).
- Make telescopes from long cardboard tubes.
- Make mini straw rockets so children can have fun blasting them up towards outer space – instructions for these are available online. You might like to talk about what happens when the children blow into the straw to make the rocket fly (increasing the pressure inside the straw).

Get talking – useful words

Astronaut, spacesuit, helmet, spacecraft, lunar rover, capsule, rocket, launch, spacewalk, telescope, solar system, sun, star, planet, moon, asteroid, comet, crater, atmosphere

Rolling action: roll, push, stamp, away, towards, across, roll gently, press harder

Prepositional language: above, below, next to, underneath, on top of, inside

Books about space

Here We Are: Notes for Living on Planet Earth by Oliver Jeffers

Look Inside: Space by Rob Lloyd Jones

Roaring Rockets by Tony Mitton

Whatever Next! by Jill Murphy