

Metaverse Classroom for Space Exploration Education



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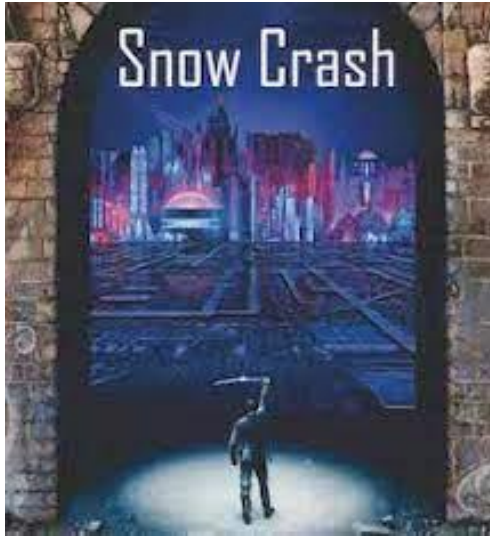
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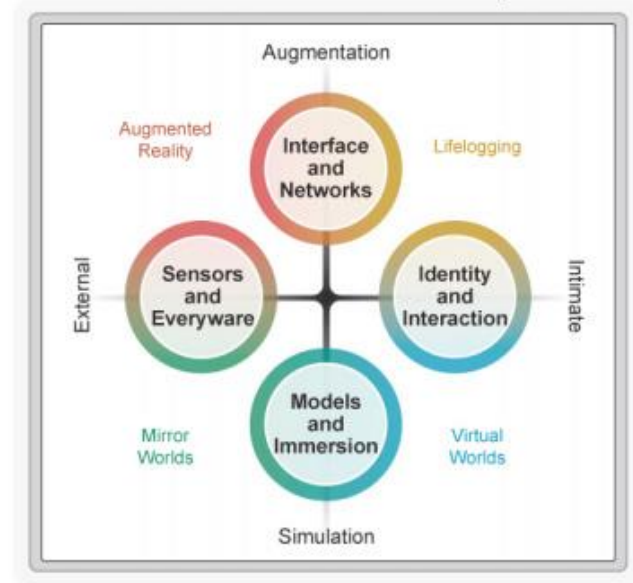
METASPACE

What is Metaverse?

Meta + Universe

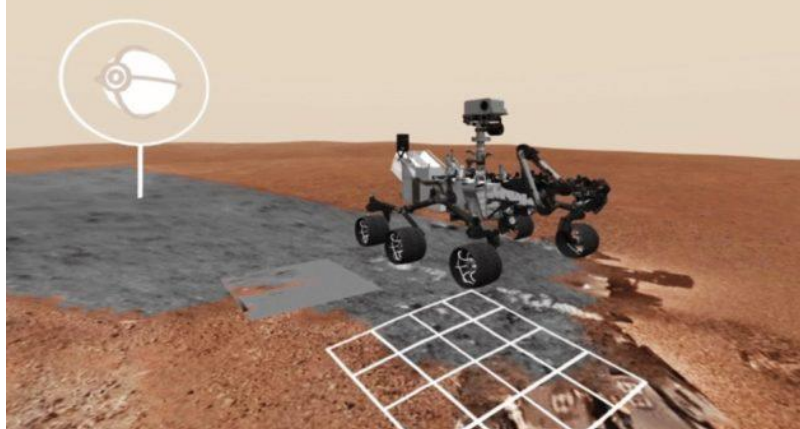


Copyright :Bantam Books,
Neal Stephenson



Metaverse roadmap pathways to the 3D Web
(Acceleration Studies Foundation(2006))

Educational Metaverse



NASA JPL Access Mars Web VR: A Virtual Walk on Mars

ZEPETO



META

Content Guide

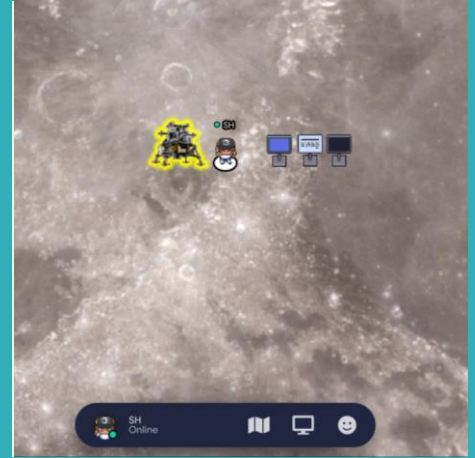


Copyright : KASI

Find today's
moon phase



Lesson 2/3



Lesson 3/3

Learning Activity Goals



Copyright : KASI

Find today's
moon phase



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Study Lunar
Exploration



Make own class

Planning and Design

Enter

Observation

Concept Study

Learning Activities

Summary

Gather Town

Metaverse Platform

<https://gather.town/>

Padlet
<https://padlet.com/>

Kahoot!
<https://kahoot.it/>

Stellarium

Astronomy simulation software

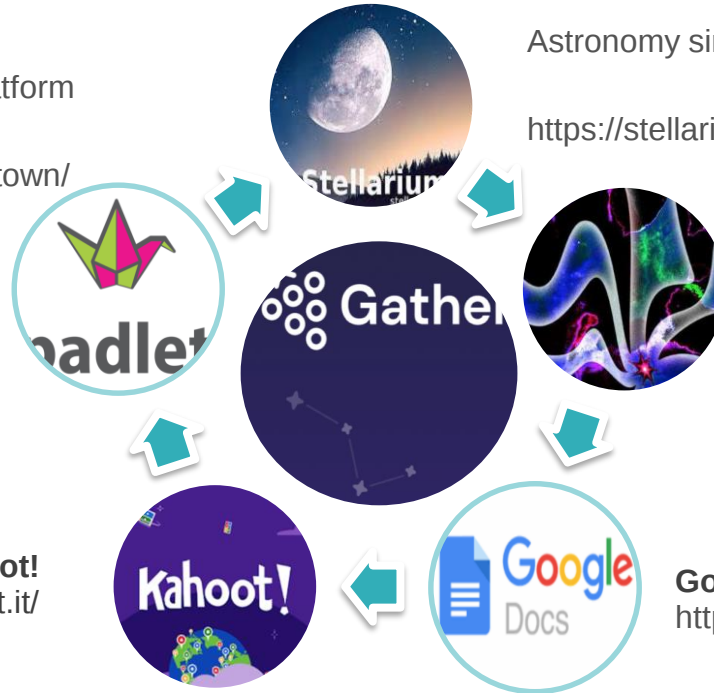
<https://stellarium.org/>

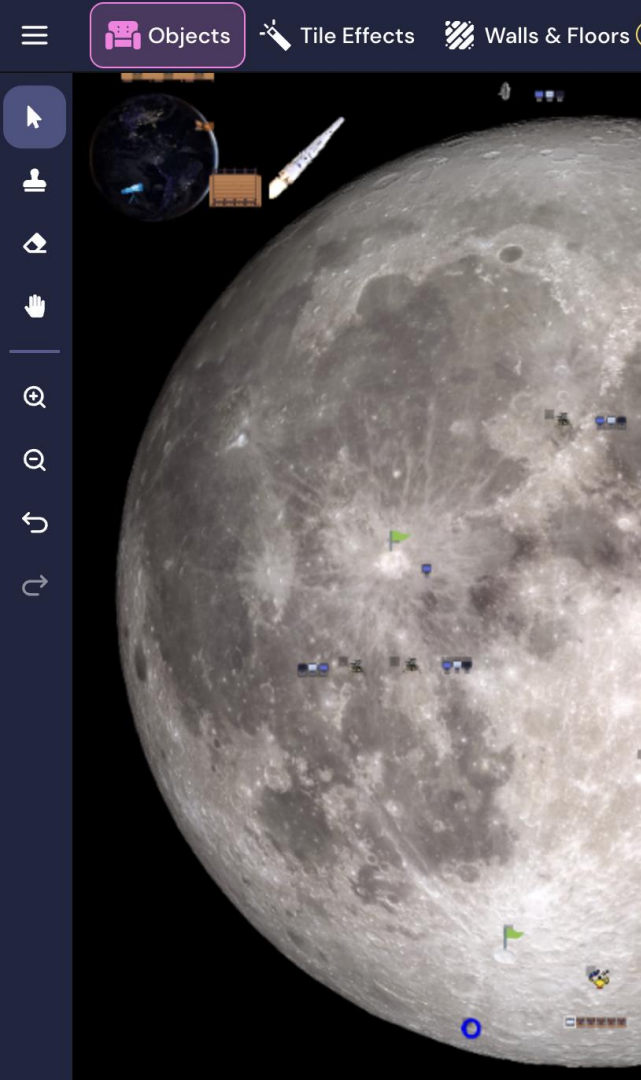
NAAP

Astronomy simulation software
for Education

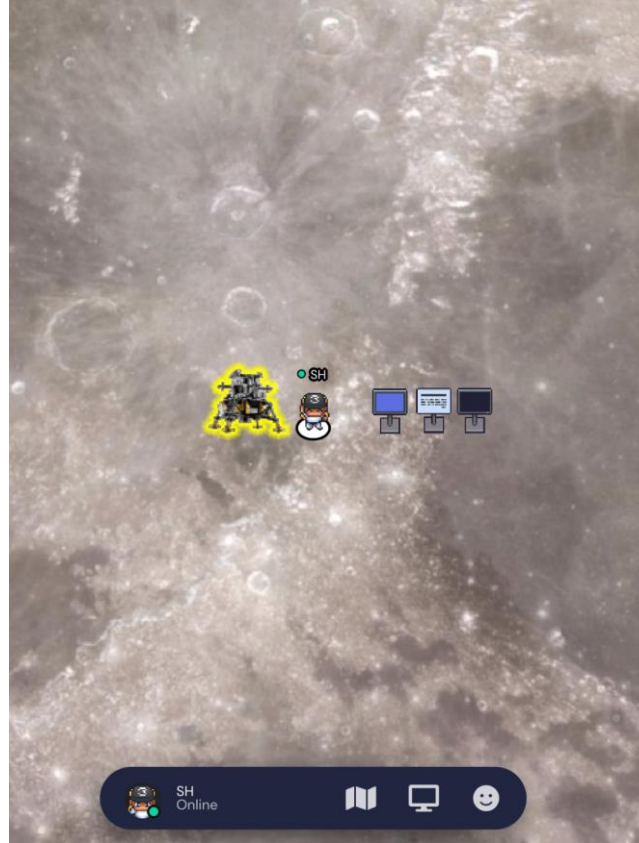
<https://astro.unl.edu/>

Google Docs
<https://docs.google.com/>





Gather Town



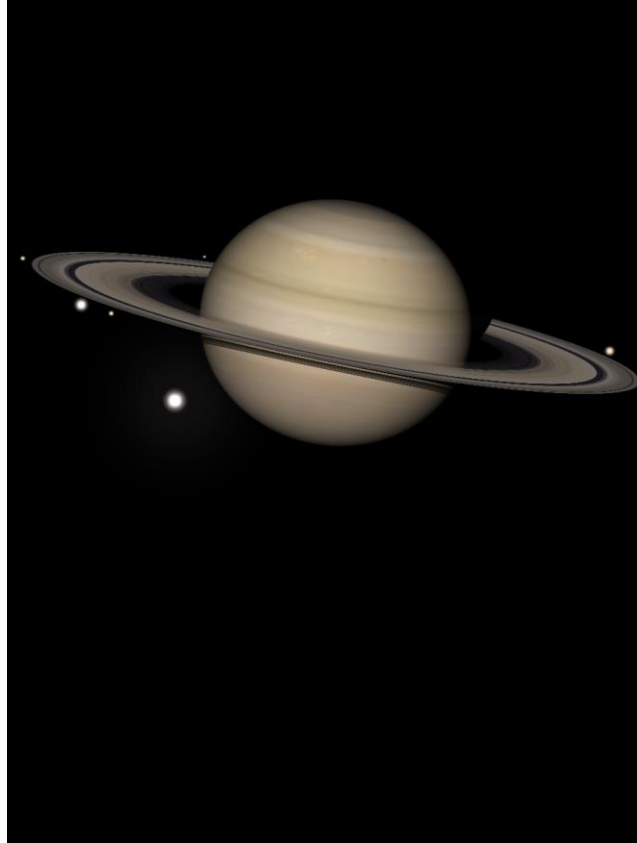
[Gather | A better way to meet online.](https://gather.town)

<https://gather.town>

Centered around fully customizable spaces, **Gather** makes spending time with your communities just as easy as real life.



Stellarium

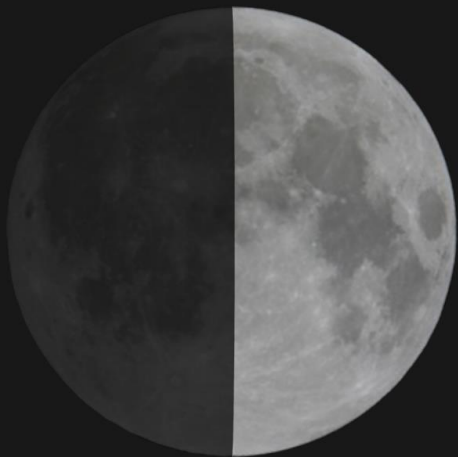


Stellarium

Astronomy simulation software
<https://stellarium.org/>

Stellarium is a free open source planetarium for your computer. It shows a realistic sky in 3D, just like what you see with the naked eye, binoculars or a telescope

First Quarter
49.4% Illuminated Visible



Time since new Moon:
7 days, 7 hours

Observer's current time:
7:35 PM

< 1 Hour

> 1 Hour

<< 1 Day

>> 1 Day

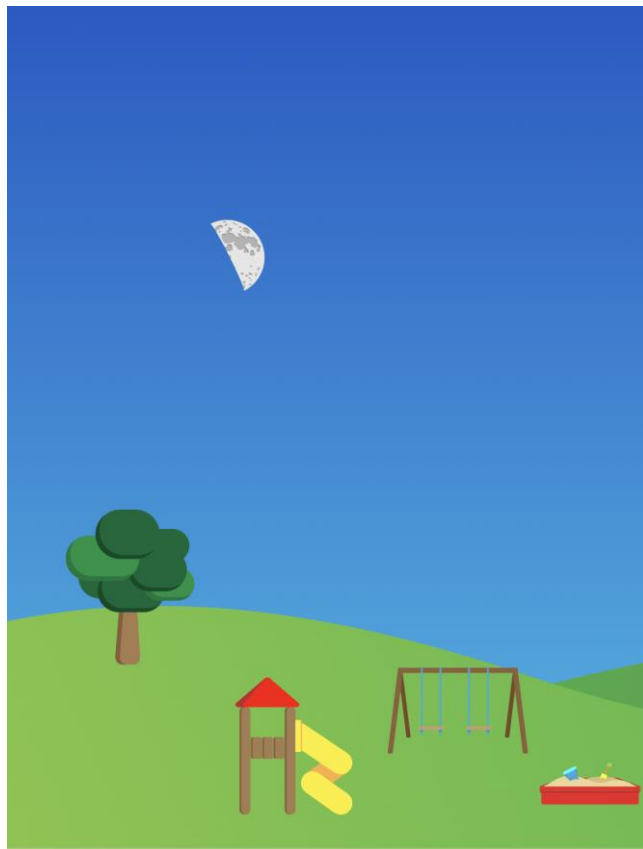


☐ Show Time Tickmarks

☐ Show Lunar Landmark

☐ Show  Moonrise/Moonset  Line

NAAP Astronomy Lab



<https://astro.unl.edu/>

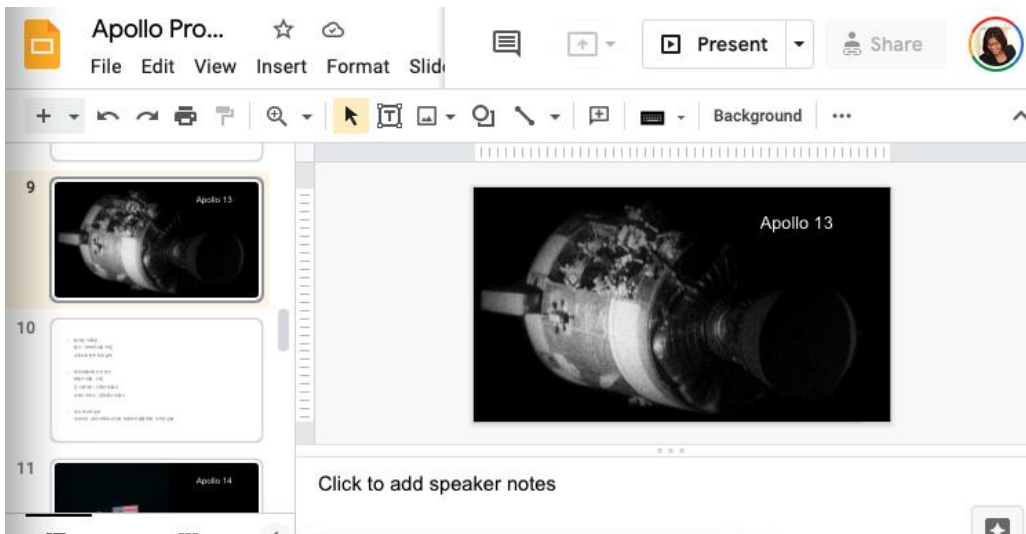
Astronomy labs and teaching
resources developed at the
University of Nebraska-Lincoln.

Google Docs and...



<https://docs.google.com>

Google Docs is an online word processor included as part of the free, web-based Google Docs Editors suite offered by Google.



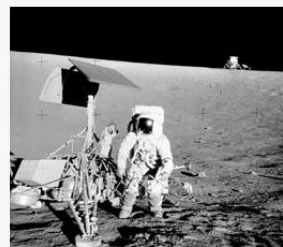
Apollo 12

From Wikipedia, the free encyclopedia

Apollo 12 (November 14 – 24, 1969) was the sixth crewed flight in the United States **Apollo program** and the second to land on the Moon. It was launched on November 14, 1969, from the Kennedy Space Center, Florida. Commander **Charles "Pete" Conrad** and Lunar Module Pilot **Alan L. Bean** performed just over one day and seven hours of lunar surface activity while **Command Module Pilot Richard F. Gordon** remained in lunar orbit.

Apollo 12 would have attempted the

Apollo 12



Commander Pete Conrad studies the Surveyor 3





<https://kahoot.com> <http://kahoot.it>

Kahoot! is a game-based learning platform, used as educational technology in schools and other educational institutions.



달탐사선 퀴즈

0 favorites 1 play 18 players

Play

Edit



A public kahoot

메타버스



KNUE_EXO

Updated 1개월 전

Questions (4)

Show answers

1 - Quiz

최초로 달 궤도에 진입한 탐사선 이름은?



10 sec

2 - Quiz

최초의 유인 달 착륙선의 이름은?



10 sec

3 - Quiz

아폴로 계획 이후 첫번째 유인 달 착륙계획의 이름은?



10 sec

4 - Quiz

달 탐사선 운영의 6번째 국가가 될 나라는?



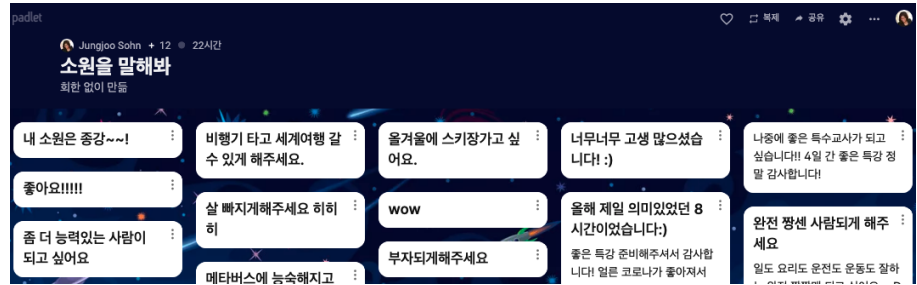
10 sec



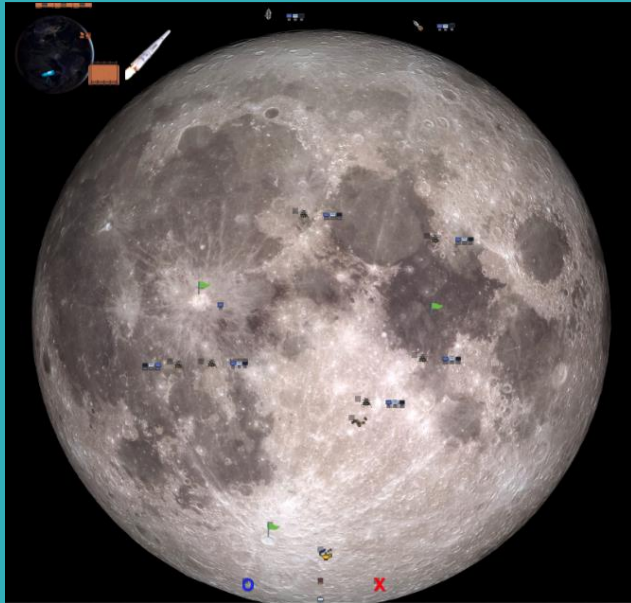
Padlet: You are beautiful

<https://padlet.com>

From your hobby to your career, your class
notes to your final exam, your mood board to



Gather Town Classroom for Space Exploration Education



It can be used in non-face-to-face situations with students, but I thought it would be good to use it as a group activity in the middle of class.



Unlike Zoom classes, it is impressive to create a school space, communicate with each other, and feel as if you are in a school space.



I am teaching Korean to foreign students, but the Zoom environment is difficult to focus on students. However, if the metaverse platform is used, it will be possible to provide a more realistic language use situation than in an actual classroom, and it will be much easier to check the learners' speech and give feedback.



First, it seems to be more useful for group activities than Zoom's small conference room because you can participate with a more enjoyable and active mind.

Second, it seems to be able to arouse students' interest and increase class participation.

Third, since it is possible to organize a class that solves a mission and moves on to the next stage, individualized class design for each level is possible.





Thank you