1
00:00:00,000 --> 00:00:03,060
Narrator: NASA Ames Research Center recently

2
00:00:03,080 --> 00:00:05,770
participated in two important outreach events held

3
00:00:05,790 --> 00:00:08,820
in the San Francisco Bay Area: Maker Faire and a

4
00:00:08,840 --> 00:00:11,070
gathering of hardware and software industry

5
00:00:11,090 --> 00:00:14,220
professionals called the Solid Conference.

6
00:00:14,240 --> 00:00:16,300
The conference became the opportunity for the

7
00:00:16,320 --> 00:00:18,790
Intelligent Robotics Group from NASA Ames to

8
00:00:18,810 --> 00:00:21,090
publicly unveil their latest version of the

9
00:00:21,110 --> 00:00:22,760
free-flying robot used on the

10
00:00:22,780 --> 00:00:25,360
International Space Station.

11
00:00:25,380 --> 00:00:26,780
Terry Fong, Director: Here you see small businesses,

12
00:00:26,800 --> 00:00:29,620
large businesses, you see hobbyists, you see makers,

13
00:00:29,640 --> 00:00:32,680

you see engineers. You see, you know, creative people.

14
00:00:32,700 --> 00:00:34,600
A lot of them come by and are just really excited

15
00:00:34,620 --> 00:00:37,020
to see us taking something which is off-the-shelf,

16
00:00:37,040 --> 00:00:39,720
a Tango smartphone, marrying it with a space robot

17
00:00:39,740 --> 00:00:41,690
and putting it on the Space Station.

18
00:00:41,710 --> 00:00:43,400
Narrator: The volleyball-sized robot called

19
00:00:43,420 --> 00:00:46,590
Synchronized Position, Hold, Engage, Reorient,

20
00:00:46,610 --> 00:00:49,450
Experimental Satellite or SPHERES uses a

21
00:00:49,470 --> 00:00:51,800
Google Android-based smartphone called

22
00:00:51,820 --> 00:00:55,810
Project Tango as its controller or "brain".

23
00:00:55,830 --> 00:00:58,830
It features an innovative 3D sensor and software

24
00:00:58,850 --> 00:01:01,640
that has been modified by the NASA team for use in

25
00:01:01,660 --> 00:01:04,240
a micro-gravity space environment.

26
00:01:04,260 --> 00:01:05,410
Terry Fong: I've seen all kinds of really

27
00:01:05,430 --> 00:01:07,810
interesting things from sensors to processors to

28
00:01:07,830 --> 00:01:10,170
software to services.

29
00:01:10,190 --> 00:01:12,120
And for me, it's a really great opportunity to

30
00:01:12,140 --> 00:01:14,230
reach out, tell people what NASA's doing and

31
00:01:14,250 --> 00:01:16,400
try to pull in some of these new creative ideas

32
00:01:16,420 --> 00:01:19,360
into the work that we're doing in space.

33
00:01:19,380 --> 00:01:21,690
Narrator: NASA also participated at the Bay Area

34
00:01:21,710 --> 00:01:24,760
Maker Faire, a gathering of more than 120,000

35
00:01:24,780 --> 00:01:28,160
innovators, enthusiasts, crafters, hobbyists

36
00:01:28,180 --> 00:01:30,030
and tinkerers to share what they have

37
00:01:30,050 --> 00:01:32,090
invented and made.

38
00:01:32,110 --> 00:01:34,320

The NASA booth was a showcase of the Agency's

39
00:01:34,340 --> 00:01:37,010
missions, highlighting designs for current small

40
00:01:37,030 --> 00:01:39,870
satellites in orbit and projects that were part of

41
00:01:39,890 --> 00:01:43,240
the NASA Grand Challenge robotics competition.

42
00:01:43,260 --> 00:01:44,960
Jason Kessler:  Being at Maker Faire it's likely

43
00:01:44,980 --> 00:01:48,150
that the first people to step foot on Mars are

44
00:01:48,170 --> 00:01:50,770
walking around the fair grounds right now.

45
00:01:50,790 --> 00:01:54,950
These are the inventors, these are the innovators

46
00:01:54,970 --> 00:01:58,290
and this is why NASA needs to be at Maker Faire.

47
00:01:58,310 --> 00:02:00,420
Narrator: The festival is a celebration of

48
00:02:00,440 --> 00:02:03,310
invention, creativity and resourcefulness where

49
00:02:03,330 --> 00:02:05,490
"makers" show off their inventions and

50
00:02:05,510 --> 00:02:08,560
share knowledge.