

isotopes⁹⁵ which is rare on Earth but plentiful⁹⁶ on the Moon and which can be used in nuclear fission⁹⁷. The Moon is also rich in aluminium⁹⁸, titanium⁹⁹, calcium⁹⁰, magnesium⁹¹, silicon⁹² and rare earth elements⁹³. Such resources are extremely⁹⁴ useful in the development⁹⁵ of green energy solutions such as electric vehicles⁹⁶ and solar panels, which is why many unmanned⁹⁷ lunar vehicles have been busily⁹⁸ collecting rock and dust samples⁹⁹. There is also a chance they will find undiscovered¹⁰⁰ substances¹⁰¹ that could be put to use¹⁰² and monetised¹⁰³. The capability¹⁰⁴ to harvest¹⁰⁵ the Moon's bounty¹⁰⁶ has been accelerated¹⁰⁷ by advances in computing¹⁰⁸ and robotics¹⁰⁹, making lunar exploration safer, more affordable¹¹⁰ and more sophisticated¹¹². It is no surprise then that¹¹³ it is not just governments but entrepreneurs¹¹⁴ who are looking to get a piece of the action¹¹⁵.

Private Enterprise¹¹⁶ and the Human Touch¹¹⁷

Artemis program plans to land the first woman and first person of colour on the Moon, possibly as early as 2024. To do that, they will need a landing craft¹²² (Human Landing System), and in April 2021, NASA awarded the USD 2.9 bln contract to develop it to¹²³ Elon Musk's SpaceX aerospace manufacturing¹²⁵ company (founded in 2002).

isotope⁹⁵ izotop
plentiful⁹⁶ plentiful obfit
nuclear fission⁹⁷ jądrowe
aluminium⁹⁸ aluminium (UK)
titanium⁹⁹ tytan (metal)
calcium⁹⁰ wapń
magnesium⁹¹ magnez
silicon⁹² krzem
rare earth element⁹³ rzadkich ziem pierwiastek
extremely⁹⁴ niezwykle
development⁹⁵ rozwój, rozwijanie, tworzenie
electric vehicle⁹⁶ pojazd elektryczny
unmanned⁹⁷ bezzałogowy
busily⁹⁸ bieżąco, pracowicie
sample⁹⁹ próbka
undiscovered¹⁰⁰ nieodkryty
substance¹⁰¹ substancja
(chemical)¹⁰² (chemiczna)
to put sth to use¹⁰³ użyć
spend¹⁰⁴ wydawać, kosztować
to monetise sth¹⁰⁵ zarabiać na czymś, przekształcić coś w gotówkę
capability¹⁰⁶ zdolność (np. do czegoś), umiejętność
to harvest sth¹⁰⁷ zbierać, zbierać plony/żniwa w jakiejś postaci, zbierać coś
bounty¹⁰⁸ nagroda, skarby, łup
to accelerate sth¹⁰⁹ przyspieszać coś
advances¹¹⁰ postępy w czymś/jakiejś kwestii
computing¹¹¹ obliczenia (komputerowe), informatyka
robotics¹¹² robotyka
affordable¹¹³ przystępny, dostępny
ceno
sophisticated¹¹⁴ wyrafinowany
it is no surprise that... it is not so praiseworthy
nie dziwi, że..., nie (więc) dziwnego, że...

The big target remains the Moon and the scale of the ambition. ever, is still small¹²⁴, financially, and in over 600 advance bookings¹²⁵. This, however, already secured USD 80 mln from et, have already secured USD 400,000 a tick- Proposed flights with Virgin Galactic, estimated to cost up to USD 400,000 a tick- ness¹²² and view of the Earth from space. lifeline¹²¹ flights to experience weightless- erate commercial flights offering once-in-a- is arguably¹²⁰ winning the short race to op- race. British maverick¹¹⁹ Richard Branson mercial world have joined the latest space Three of the biggest hitters¹¹⁸ in the com-

from the Apollo 11 landing. The NASA living, the oldest being Buzz Aldrin (91) and the 1930s. Of those, only four are still America's Midwest¹²¹, born in the 1920s on the Moon. All were white men from only 12 people have ever stepped foot what NASA intends to do. Remarkably¹²⁰, us reconfigure¹²² that statement, which is of landing a man on the Moon. But let tion, there is still a strong emotional pull¹²³ vide a practical means of lunar exploration, Mars, and while robots pro- The big target remains the Moon and

entrepreneur¹¹⁴ przedsiębiorca (r) przedsiębiorca

to get a piece of the action¹¹⁵ to get a piece of the action to get a piece of the action

private enterprise¹¹⁶ prywatne przedsiębiorstwo

human touch¹¹⁷ ludzka ręka (przynajmniej do czegoś jakiegoś osoby, a nie robota, maszyn itp.)

big hitter¹¹⁸ poważny gracz (np. na rynku) (pot.)

maverick¹¹⁹ maverick, niepokorny, niezależny

arguably¹²⁰ prawdopodobnie, możliwe

once-in-a-lifetime¹²¹ raz w życiu (tylko)

weightlessness¹²² nieważkość

advance booking¹²³ rezerwacja

small beer¹²⁴ coś mało

in terms of X¹²⁵ w kontekście X

ultimate¹²⁶ ostateczny, w końcu

means of sth¹²⁷ sposób

on a case-by-case basis¹²⁸ na podstawie przypadku

emotional pull¹²⁹ emocjonalna więź

to reconfigure sth¹³⁰ przekształcić coś

remarkable¹³¹ niezwykły

Midwest¹³² Środkowy Zachód (USA)

landing craft¹³³ pojazd kosmiczny

to award sth to sb¹³⁴ przyznać coś

to accelerate sth¹³⁵ przyspieszać coś

advances¹³⁶ postępy

computing¹³⁷ obliczenia

robotics¹³⁸ robotyka

affordable¹³⁹ przystępny, dostępny

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