

AMERICA'S EMERGING URANIUM PRODUCER

Corporate Presentation – January 2020



Disclaimer

Statements contained in this presentation which are not historical facts are forward-looking statements that involve risks, uncertainties and other factors that could cause actual results to differ materially from those expressed or implied by such forward-looking statements. Factors that could cause such differences, without limiting the generality of the following, include: risks inherent in exploration activities; volatility and sensitivity to market prices for uranium; volatility and sensitivity to capital market fluctuations; the impact of exploration competition; the ability to raise funds through private or public equity financings; imprecision in resource and reserve estimates; environmental and safety risks including increased regulatory burdens; unexpected geological or hydrological conditions; a possible deterioration in political support for nuclear energy; changes in government regulations and policies, including trade laws and policies; demand for nuclear power; failure to obtain necessary permits and approvals from government authorities; weather and other natural phenomena; and other exploration, development, operating, financial market and regulatory risks. Although Uranium Energy Corp believes that the assumptions inherent in the forward-looking statements are reasonable, undue reliance should not be placed on these statements, which only apply as of the date of this release. Uranium Energy Corp. disclaims any intention or obligation to update or revise any forwardlooking statement, whether as a result of new information, future event or otherwise.'

Notice to U.S. Investors: The mineral resources referred to herein have been estimated in accordance with the definition standards on mineral resources of the Canadian Institute of Mining, Metallurgy and Petroleum referred to in NI 43-101 and are not compliant with U.S. Securities and Exchange Commission (the "SEC") Industry Guide 7 guidelines. In addition,

measured mineral resources, indicated mineral resources and inferred mineral resources, while recognized and required by Canadian regulations, are not defined terms under SEC Industry Guide 7 and are normally not permitted to be used in reports and registration statements filed with the SEC. Accordingly, we have not reported them in the United States. Investors are cautioned not to assume that any part or all of the mineral resources in these categories will ever be converted into mineral reserves. These terms have a great amount of uncertainty as to their existence, and great uncertainty as to their economic and legal feasibility. In particular, it should be noted that mineral resources which are not mineral reserves do not have demonstrated economic viability. It cannot be assumed that all or any part of measured mineral resources, indicated mineral resources or inferred mineral resources will ever be upgraded to a higher category. In accordance with Canadian rules, estimates of inferred mineral resources cannot form the basis of feasibility or other economic studies. Investors are cautioned not to assume that any part of the reported measured mineral resources, indicated mineral resources or inferred mineral resources referred to herein are economically or legally mineable.

Exploration Target Disclosure: In the Company's subject technical report all tonnages, grade, and contained pounds of uranium should not be construed to reflect a calculated mineral resource (inferred, indicated, or measured). The potential quantities and grades, as stated in the technical report, are conceptual in nature and there has been insufficient work to date to define a NI 43-101 compliant resource. Furthermore, it is uncertain if additional exploration will result in the discovery of an economic mineral resource on the project.





100% Un-Hedged Book for Maximum Upside

Align with contrarian long-term capital

Grow Permitted Capacity and Production Readiness

Develop low-cost and scalable ISR operations

Downturn Presented Acquisition Opportunities

Best time to acquire future exploration & development pipeline



Diversified Asset Portfolio Low-Cost ISR & Production Ready



Infrastructure - Texas

Hobson Processing Plant - Production Capacity of 2Mlbs/year

Texas Hub & Spoke ISR Portfolio

| Project Name | Ctoro | Resources (Mibs) | | |
|----------------------------|-----------|------------------|----------|--|
| Flojectivallie | Stage | M&I | Inferred | |
| Palangana (Fully Permitte | ed) (NT) | 1.1 | 1.2 | |
| Goliad (Fully Permitted) | (NT) | 5.5 | 1.5 | |
| Burke Hollow (Fully Permit | ted) (NT) | - | 7.1 | |
| Salvo | (E) | - | 2.8 | |

Reno Creek ISR Project (Fully Permitted)

| Project Name | Ctoro | Resources (Mlbs) | | |
|--------------|--------------|------------------|----------------|--|
| | Stage | M&I | Inferred | |
| Reno Creek | (NT) | 26 | 1.49 | |
| | Licensed for | or 2Mlhs/v | ear production | |

Uranium

Titanium

Vanadium

Stage:

- (E) Exploration
- (D) In Development
- (NT) Near Term Production

| | Canada - Athabasca Basin | | | |
|--------------|--------------------------|-------|------------------|----------|
| Drainat Nama | | Chana | Resources (Mlbs) | |
| | Project Name | Stage | M&I | Inferred |
| | Diabase | (F) | NA | NA |

Paraguay ISR Uranium PortfolioProject NameStageResources (Mlbs) M&I InferredYuty(D)8.92.2

(E)

| Oviedo | (L) | Exploration | Target |
|------------------|------------|-------------|--------|
| | | | |
| | | * | |
| Paraguay Titanii | um Busines | SS | |

Alto Paraná

Oviedo

4.94 Billion Tons Grading 7.41% TiO2 and 23.6% Fe2O3

U.S. Hardrock Pipeline (Uranium & Vanadium)

| Project Name | Stage | Resources (Mlbs) | | |
|-------------------|-------|------------------|----------|--|
| Floject Name | Stage | M&I | Inferred | |
| Anderson | (D) | 17.0 | 12.0 | |
| Workman | (D) | - | 5.5 | |
| Slick Rock (U308) | (D) | - | 11.6 | |
| Slick Rock (V205) | (D) | - | 69.6 | |

Strategic Equity Interest

URANIUM

Largest shareholder in Uranium Royalty Corp (Pre-IPO)

The only pure play uranium royalty and streaming company and major shareholder in Yellow Cake plc

Please refer to a detailed breakdown of NI 43-101 resources and disclaimer in this presentation



23-56

U.S. Project Portfolio Infrastructure, Resources and Permits

Texas Hub & Spoke ISR Portfolio

Uranium Stage: (E) Exploration (D) In Development (NT) Near Term Production

Hobson Processing Plant Production Capacity of 2 Mlbs/year



Wyoming Reno Creek ISR Project

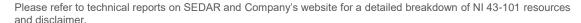


South Texas

ISR Hub & Spoke Production Strategy

U.S. Conventional Portfolio







Our Team



Amir Adnani
President, CEO, Director

An entrepreneur, founding CEO of UEC, founder and Chairman of GoldMining Inc., with extensive experience building natural resource companies.



Robert Underdown

VP of Production

Has held senior operational positions at ISR uranium mines in Texas for over 35 years.



Spencer Abraham

Chairman, Board of Directors

Served as a U.S. Senator from 1995 to 2001, as Secretary of Energy from 2001 to 2005 and previously as non-executive Chairman of Areva's U.S. board.



Clyde Yancey

VP of Exploration

Over 35 years of experience in uranium exploration in North and South America.



Scott Melbye

Executive Vice President

35 years of experience in senior roles with uranium majors, Cameco, Uranium One, and Kazatomprom. Former President of Uranium Producers of America and Chair of the World Nuclear Fuel Market.



Andy Kurrus

VP of Resource Development

Over 30 years experience with uranium exploration in the United States.



UEC at a Glance

Member of the Russell 3000® Index

| Cash ⁽¹⁾ Securities ⁽²⁾ | \$13.1 M 14 M shares of URC wit | h market value of \$12.5 M | |
|--|--------------------------------------|--|---------------------------------|
| Share Structure | 183.3 M Outstanding | 19.4 M 10.3 M Warrants + Options ⁽³⁾ | 214.0 M Fully Diluted |
| Recent Activity | \$0.91 As of January 3, 2020 | 687,325 Avg. Daily Vol. (3-mo) | |
| Market Cap | \$167 M As of January 3, 2020 | \$20 M ⁽⁴⁾ Long-Term Debt | |
| Top Shareholders | | lobal Natural Resources Fund, Bla | |

KCR Fund, Vanguard Group and Global X Management, Geiger Counter

⁽⁴⁾ No principal repayments until maturity on January 31, 2022

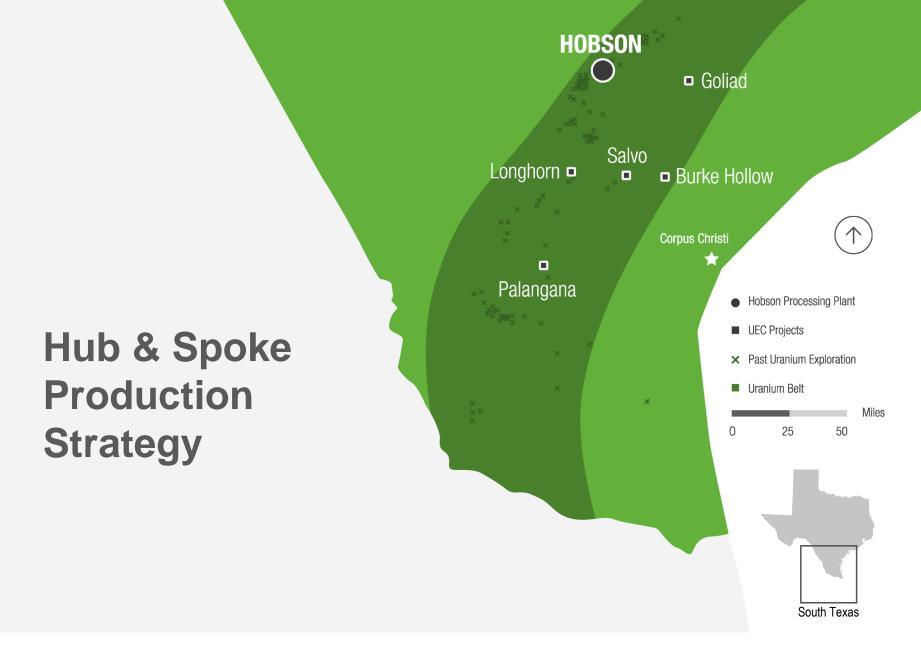
| ANALYST | David Talbot, Eight Capital | Mike Kozak, Cantor Fitzgerald | Joseph Reagor, |
|----------|-----------------------------------|---------------------------------------|-----------------------|
| COVERAGE | Heiko Ihle, H.C. Wainwright & Co. | Colin Healey, Haywood Securities Inc. | ROTH Capital Partners |



⁽¹⁾ As of the Company's filing for the period ended October 31, 2019

⁽²⁾ Uranium Royalty Corp (URC: TSX-V) having a current trading price of CAD\$1.18 at closing on Dec 13, 2019. These shares are subject to escrow and resale restrictions as set forth in URC's final prospectus filing

^{(3) \$50.7} M cash to be received should all warrants and options be exercised





Hobson is fully licensed and permitted.





The Processing Plant has a 2Mlbs / year physical capacity



Palangana ISR Mine First Producing Mine Proof of Concept

\$10M Initial CAPEX

6 months construction timeline

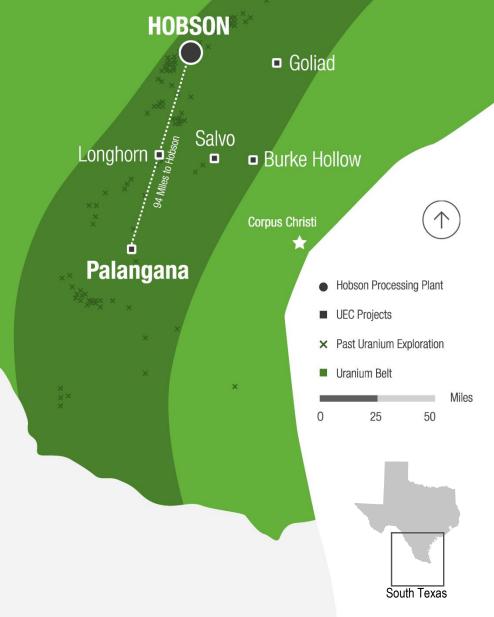
Production Ready

Low cash-cost of \$21.77/lb during operation

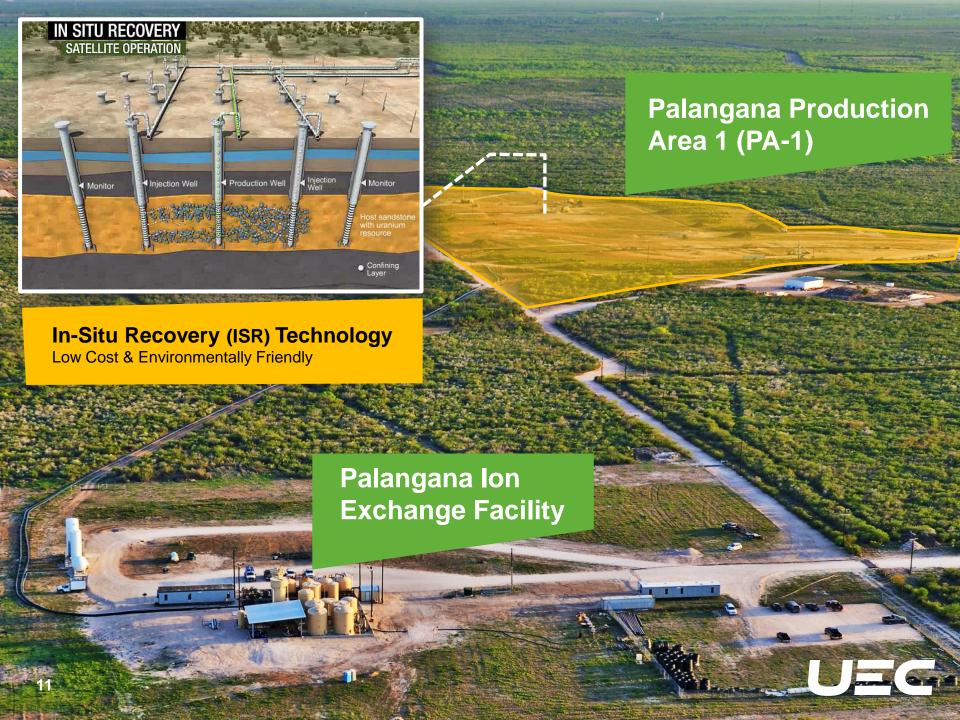
 Fully permitted including expanded mine permit

Similar Costs for Future Projects

 The major permits for production have been issued for Goliad and Burke Hollow







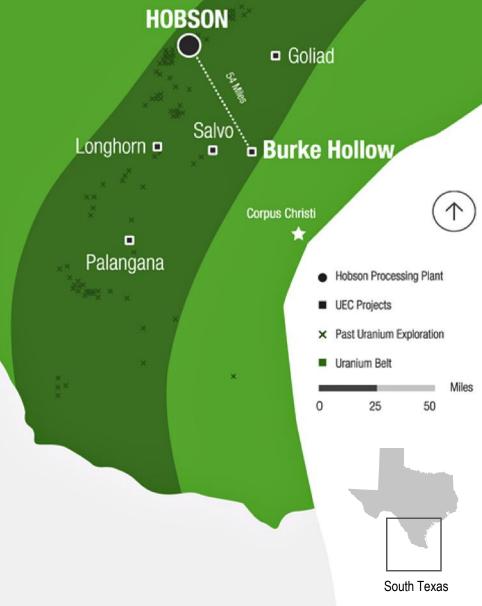


Resin Hauling Truck And Trailer



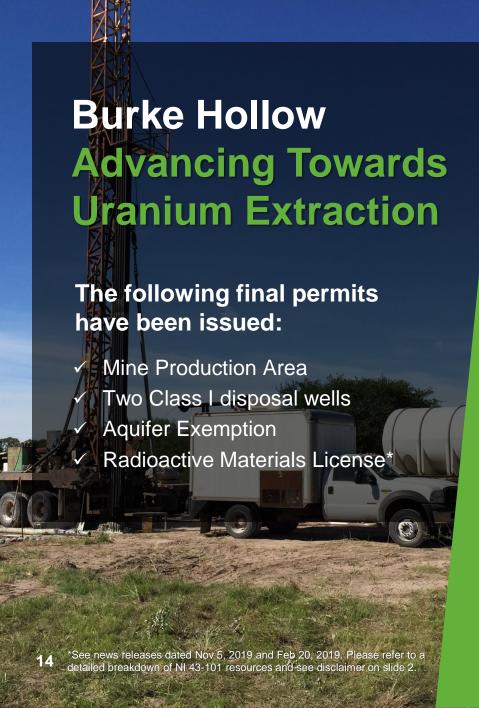
Burke Hollow ISR Project Growth Ahead

- Discovery of six trends since 2012
- 7.09Mlbs in 4.06Mt grading 0.088% U3O8
- Leach amenability testing indicates recovery greater than 90%
- 20,000 acres located ~50 miles from Hobson Processing Plant.
- 55% of the property unexplored



^{*}See news release dated Nov 5, 2019 and refer to a detailed breakdown of NI 43-101 resources and disclaimer on slide 2.





2019 Drilling Discovers Additional Mineralization in Production Area 1

- √ 76 monitor wells installed
- Enlarged the Production Area
 Authorization 1 (PAA-1) zone

Next Step: Resume drilling to complete the installation of an expanded PAA-1 monitor well ring



Reno Creek ISR Project

The largest permitted, pre-construction ISR uranium project in the U.S.

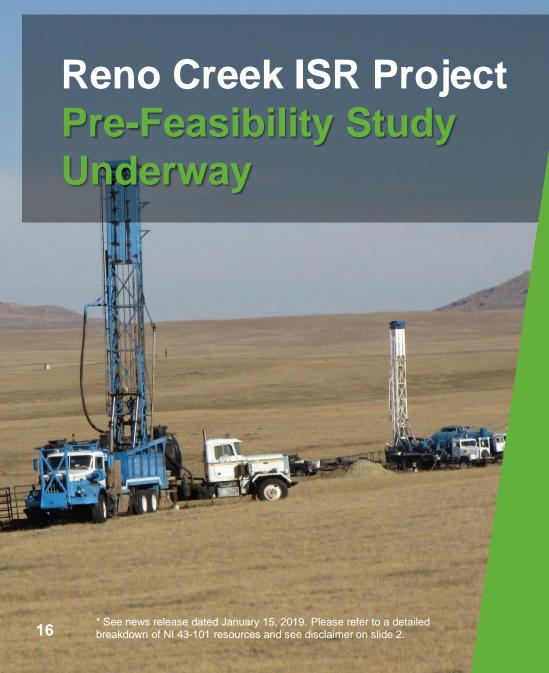
Buffalo

Strategic Location within the Heart of the **Powder River Basin**, **Wyoming**

Gillette

¹⁻⁹⁰ **Irigaray** Uranium One **North Butte** Cameco **Christensen Ranch** RENO CREEK, UEC **Uranium One Moore Ranch** Uranium One **Smith Ranch** Highland Cameco Casper **Processing Plant** Active ISR Operation Wyoming, USA Fully Permitted 25 50

^{*} See news release dated January 15, 2019. Please refer to a detailed breakdown of NI 43-101 resources and see disclaimer on slide 2.



M&I Resource 26Mlbs of U3O8 grading 0.041% within 32Mt*

Inferred Resource 1.49Mlbs of U3O8 grading 0.039% within 1.92Mt*

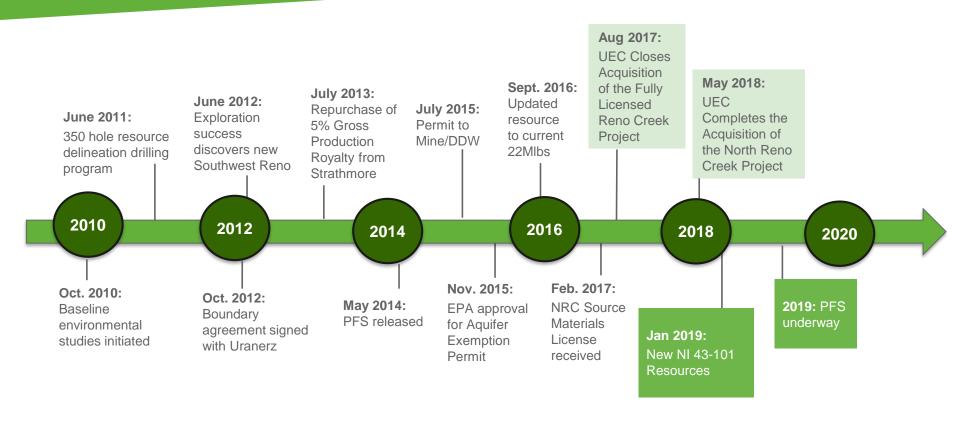
First time since 1980 that the major mineralized trends have been consolidated

Considerable ISR exploration and expansion potential

Production permits in place



Reno Creek: Project Timeline

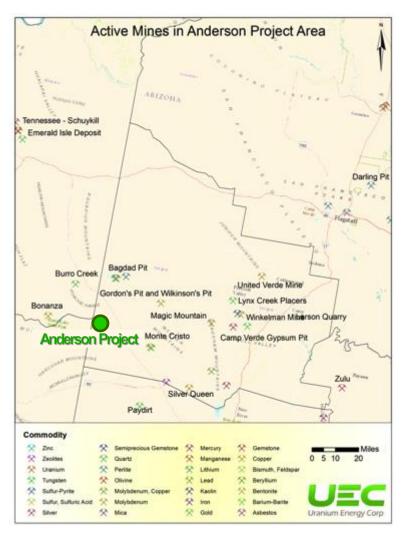




^{*} See news release dated January 15, 2019. Please refer to a detailed breakdown of NI 43-101 resources and see disclaimer on slide 2.

Anderson Project - Arizona

NI 43-101 compliant resource*: Indicated Resource: 29.5Mt, 17Mlbs avg. grade of A Large U.S. 0.029% Resource Inferred Resource: 14.3Mt, 12Mlbs with avg. grade of 0.046% 9,852 Acres Project located ~75 miles northwest of Phoenix, AZ Between 1955-1958 with ~\$40M spent by previous **History** operators, including Urangesellschaft Extensive Feasibility studies, milling studies, and hydrological reports previously completed by third parties Work





^{*}NI 43-101 Technical Report completed and available on SEDAR and see disclaimer on slide 2

Slick Rock Project - Colorado

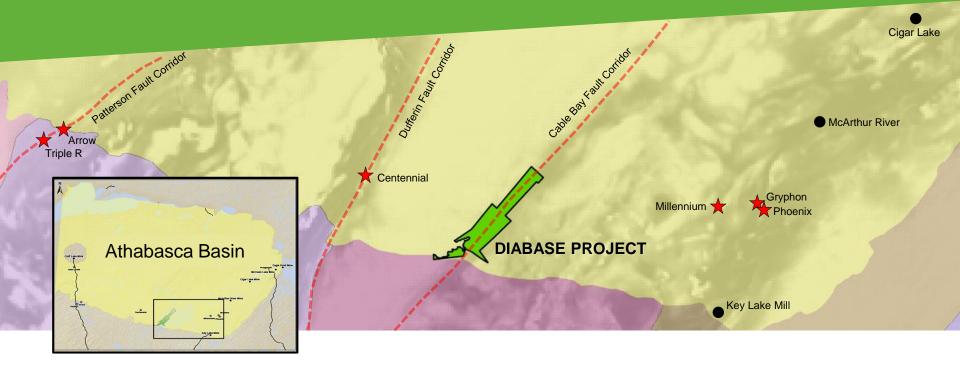
NI 43-101 Compliant Resource*: • Inferred Resource: 2.5Mt, 11.6Mlbs avg. **Technical** grade of 0.228% Report • Inferred Resource: 2.5Mt, 69.6Mlbs vanadium with avg. grade of 1.37% Low \$21M initial CAPEX with an annual production CAPEX of 438,000 pounds U3O8 + vanadium inferred Vanadium Resource of 2.549Mt grading 1.37% V2O5 and containing 69.6Mlbs Resource Nearby Projected sale of mined product to the White Mesa mill in nearby Blanding, UT Infrastructure



*NI 43-101 Technical Report completed and available on SEDAR and see the Company's disclaimer



Diabase Project - Saskatchewan, Canada



- Athabasca Basin Premier District
- Over \$20 million in Historical Exploration Work
- Over 21,000 meters of Diamond Drilling to date
- UEC Acquisition Cost at \$500K resulting in 0.1% Dilution to UEC Shareholders
- Diabase Project covers large land package of 21,949 hectares
- Within 75 km of Key Lake Mill



ISR District Opportunity in Paraguay

Similar geology as South Texas and leveraging ~\$50M of historic exploration work by Anschutz and Cameco, including new work completed by UEC.

| Project | Historic Operator | Stage | Resource (M lbs) |
|---------|---------------------------|------------------------------|---|
| Yuty | Cue Resources / Cameco | Exploration / Development | 8.9Mlbs in 7.8Mt grading 0.052% U3O8 M&I and 2.2Mlbs in 2.1Mt grading 0.047% U3O8 Inferred* |

| Project | Historic Operator | Stage | Exploration Target (M lbs) |
|---------|-------------------|-------------|---|
| Oviedo | Anschutz Corp | Exploration | 23 - 56Mlbs in 28.9 - 53.8Mt grading 0.04% to 0.052% U3O8* |





^{*}NI 43-101 Technical Report completed and available on SEDAR and see Company's disclaimer

Alto Paraná Titanium Project

Project Overview

- One of the highest-grade and largest-known Ferro-Titanium deposits in the world
- NI 43-101 compliant resource with a mineral exploration claim of 70,498 hectares
- PEA study underway in 2019



| Cut-Off | % TiO ₂ | % Fe ₂ O ₃ | % Ilmenite | Tonnes Billions | Thickness (m) |
|---------|-----------------------|-------------------------------------|------------|--------------------|------------------|
| 6.0 | 7.41 | 23.58 | 13.95 | 4.94 | 6.61 |

*NI 43-101 Technical Report completed and available on SEDAR and see disclaimer on slide 2

Project History



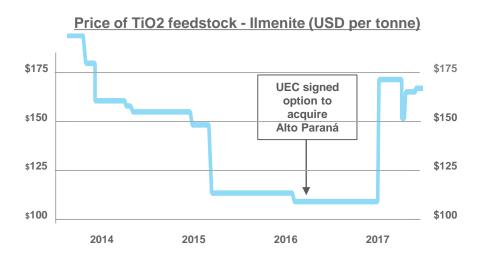


Titanium Feedstock Market – TiO2 prices hitting 3-year highs

- 90% of TiO2 feedstocks (ilmenite) used for pigment manufacturing
- Strong price recovery for ilmenite since 2017, with positive outlook, driven by:
 - Strong pigment demand & balanced inventory levels
 - Environmental and yield advantages of high-grade feedstock
 - High-grade feedstock supply deficit

TZMI 2018 – "Industry urgently needs new supply"

Good fit for Alto Parana – capable of producing high-grade TiO2 feedstock for both sulfate or chloride slag production



Large deficits post 2020 without new supply



Source: TZMI Nov 2018



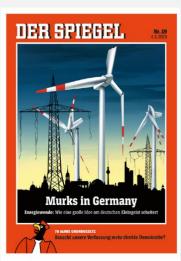




Germany's "Energiewende" "Failed Energy Policy"

160 Billion Euro Investment in "Green Energy" has resulted in:

- Zero Progress in Reducing Carbon Emissions
- Expensive Electricity 50% higher than Nuclear France
- Reduced Reserve MarginsReliability Issues
- Reliance on dirty lignite Coal and Russian Gas
- Competitive disadvantage for German Industry
- Loss of confidence in German Government



Translation "A botched job in Germany"

France Gets 72% of its Electricity from Nuclear Power

THEY ENJOY:

- ✓ Per kW carbon emissions 1/10 that of Germany
- ✓ Electricity rates 1/2 that of Germany
- Clean air with abundant and affordable energy

Policies to reduce nuclear reliance overturned. Smart move in light of "Yellow Vest" outrage on gas tax.





Nuclear Power - Highest Growth in Past 25 Years42 Reactors Connected in 6 Years; 55 Units Under Construction

CHINA to triple nuclear power capacity by 2030

INDIA plans for 21 new nuclear reactors by 2031

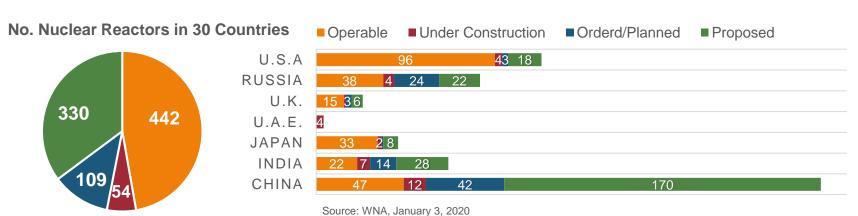
RUSSIA is building 22 reactors in China, India, Turkey, Bangladesh, Egypt, Iran, Finland, Belarus, and Hungary

U.S. is completing two new AP-1000 reactors in Georgia

U.A.E. completing construction on 4 units

U.K. upgrading nuclear fleet to new advanced reactors

JAPAN recovery: 20-22% from nuclear power by 2030 – about 30 reactors. Of its 33 operable reactors, 9 reactors have restarted; 6 have been approved for restart and 10 more have applied for a restart.





SMR's and Advanced Reactors An Important Emerging Market

- SMR global market: 65-85 GWe
 by 2035 small scalable reactors:
 - Size: 5 up to 300 MWe
 - Simpler design lower capital and operating cost
 - Cost competitive with natural gas
- Western U.S. utilities planning for 12 of the NuScale Power SMRs to be in commercial operation by 2025







Reactor Demand Significantly Exceeds Primary Production

Spot Prices Below Production Costs and Hedges Falling Off

2020 Demand Expected at 183Mlbs

2020 Primary Production Expected at 142Mlbs

2020 + 2021 Primary Production is **85Mlbs Below Requirements**

Cumulative Gap is > 565Mlbs by 2030







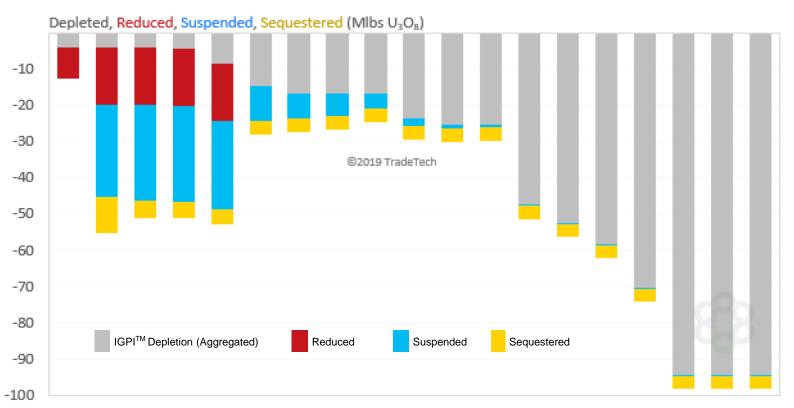




Supply Cuts, Exhaustion, Reduction, Suspension

Mine Cutbacks, Depletion, Speculative Interest Accelerating Market Rebalancing

Aggregate Impact of Restricted Primary Supply



2017 2018 2019 2020 2021 2022 2023 2024 2025 2026 2027 2028 2029 2030 2031 2032 2033 2034 2035

Source: TradeTech August 2019



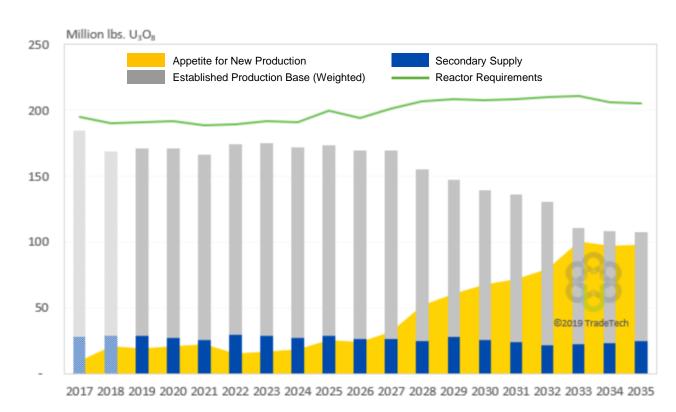
Need for New Production – Beyond Existing Mines

Trade Tech's "Market Appetite" for New Production

Inventory Overhang Drawing Down

Uranium Price Too Low to Stimulate New Production

Within the Permitting and Development Lead Times to Bring On New Mines



• All assumptions are consistent with TradeTech's latest proprietary assumptions, August 2019 (i.e. Q2 2019);

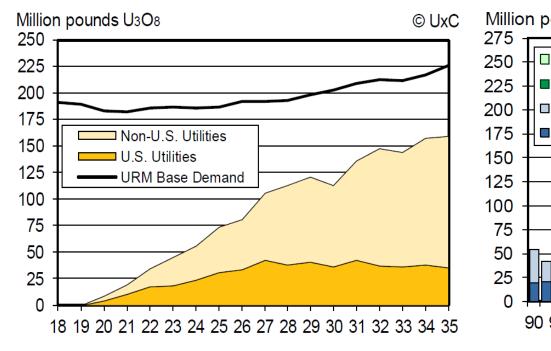
• Established Production Base shown is weighted to assimilate the challenge of existing operations remaining at full capacity over Life-of-Mine.

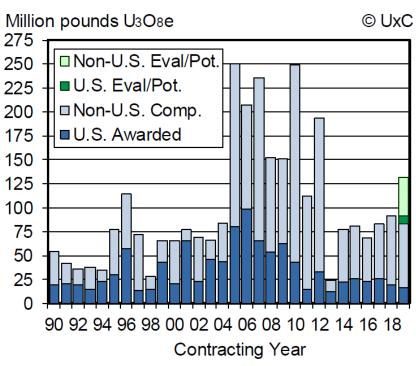


Utility Procurement Cycle: Old Contracts Rolling Off...New Contracts Need to be Signed

Utility Uncommitted Demand

Historic Long Term Contracting

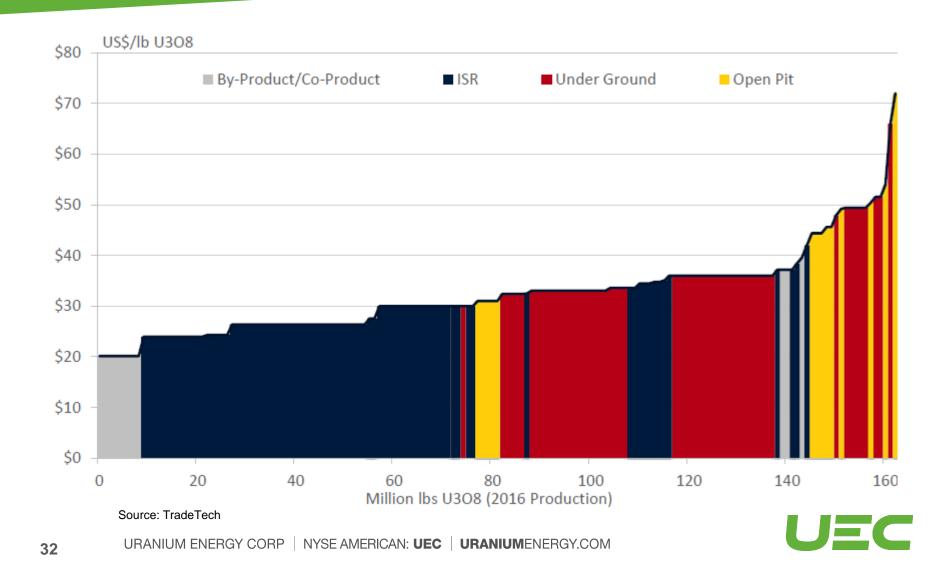




Source: UxC Market Outlook Q4 2019

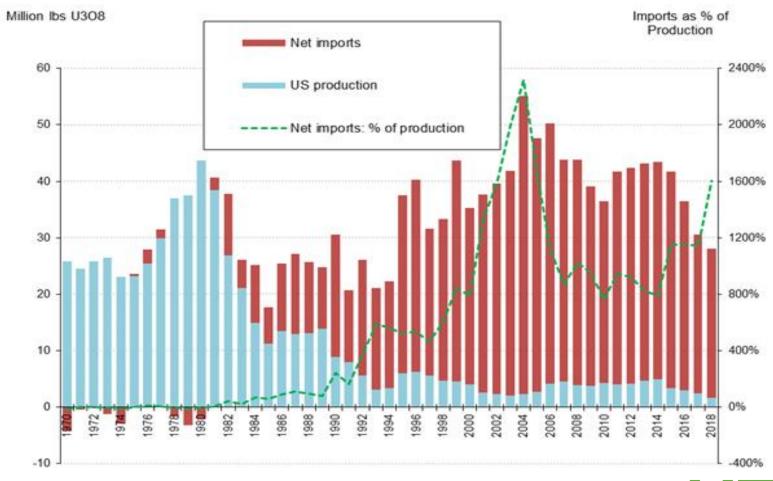


Global Cost Curve – Most U.S. Production is ISR



Overdependence on Foreign Supplies

U.S. Uranium Imports vs. Production: 1970-2018



Source: EIA Report 2018, Ux Consulting

American Energy & National Security – Presidential Nuclear Fuel Working Group Established

232 Process Results in Presidential Working Group to Revitalize Domestic Uranium and Nuclear Fuel Cycle.

U.S. Mines Now Supply < 1% of Domestic Uranium Requirements.

Over 40% of Imports From Russia/ Kazakhstan/ Uzbekistan.

100% of Military Requirements Must be Met by U.S. Origin Uranium.









President Trump Determined that a Strong Domestic Nuclear Fuel Cycle is in the Nation's National Security Interests.

Presidential Task Force of 13 Departments and Agencies, including Defense, State, Energy, Commerce, Interior, National Security, FERC, NRC, Economic Council.

Policy Recommendations to Revitalize Industry Results <u>Due Soon</u>.





Uranium Price History (\$24.85/ lb today – up 40% from November 2016 low)



Bottom Line - Positive Market Outlook

- ✓ Demand Growth 42 reactors added to grid in past six years. Global nuclear energy generation has recovered to pre-Fukushima levels.
- ✓ Underinvestment and Supply Cutbacks Kazakhs, Cameco, Orano, and others, resulting in significant primary supply deficit.
- ✓ Lead Time to Advance Large New Mines can be 7 to 10 years (or longer), approx. \$60/lb + incentive price
- Accelerated Market Re-Balancing Growing primary production shortfall will impact market
- ✓ Utility Procurement Cycle Looming "New" fundamentals have not been tested
- ✓ Speculative Interest in Physical Throwing "gasoline on the fire"
- ✓ Upward Volatility in Uranium Price is Inevitable despite pullbacks
- ✓ U.S. production in 2019/2020 expected to be < 1% of U.S. reactor needs care and maintenance status. President's Working Group to develop recommendations for reviving and expanding domestic nuclear fuel production <u>due soon</u>.



Investment Summary

- 100% unhedged.
- Pipeline of low-cost ISR projects potential production profile of 4Mlbs/year in Texas and Wyoming.
- Fully permitted and state of the art Infrastructure advantage with Hobson Processing Plant.
- 2019/2020: Advancing production-readiness at Reno Creek and Burke Hollow ISR projects.
- Market Fundamentals continue to improve with a growing deficit between primary production and reactor requirements



Combined Resource Summary⁽¹⁾



| Projects | | Measured & Ind | licated | | Inferred | |
|-------------------------------------|---|---|--|------------------------------|---|---|
| Hub & Spoke ISR Portfolio Texas ISR | Tons ('000) | Grade (% U ₃ O ₈) | Lbs U ₃ O ₈ ('000) | Tons ('000) | Grade (% U ₃ O ₈) | Lbs U ₃ O ₈ ('000) |
| Palangana | 393 | 0.14 | 1,057 | 328 | 0.18 | 1,154 |
| Burke Hollow | - | - | - | 4,064 | 0.088 | 7,093 |
| Goliad | 3,790 | 0.05 | 5,475 | 1,547 | 0.05 | 1,501 |
| Salvo | - | - | - | 1,200 | 0.08 | 2,839 |
| Longhorn | | | Developmenta | al with historical resources | S | , |
| Texas ISR Total | 4,183 | 0.095 | 6,532 | 7,139 | 0.10 | 12,587 |
| Wyoming ISR | | | | | | |
| Reno Creek | 32,000 | 0.041 | 26,000 | 1,920 | 0.039 | 1,490 |
| Wyoming ISR Total | 32,000 | 0.041 | 26,000 | 1,920 | 0.045 | 1,490 |
| U.S. Conventional Portfolio | Tons ('000) | Grade (% U ₃ O ₈) | Lbs U ₃ O ₈ ('000) | Tons ('000) | Grade (% U ₃ O ₈) | Lbs U ₃ O ₈ ('000) |
| Anderson, AZ | 29,532 | 0.03* | 17,000 | 14,295 | 0.04* | 12,000 |
| Workman Creek, AZ | - | - | - | 3,222 | 0.09 | 5,542 |
| Slick Rock, CO | - | - | - | 2,549 | 0.228 | 11,600 |
| Los Cutaros, AZ | | | Developmenta | al with historical resources | S | |
| C de Baca, NM | | | Developmenta | al with historical resources | S | |
| Dalton Pass, NM | | | | al with historical resources | | |
| Long Park, CO | | | Developmenta | al with historical resources | | |
| U.S. Conventional Total | 29,532 | 0.03* | 17,000 | 20,066 | 0.12 | 29,142 |
| Canadian Conventional Portfolio | | | | | | |
| Diabase, SK | | | Developmenta | l with historical resourc | ces | |
| Paraguay ISR | | | | | | |
| Yuty | 8,621 | 0.05* | 8,914 | 2,353 | 0.05 | 2,226 |
| Coronel Oviedo | | | Developmenta | al with historical resources | S | |
| Paraguay ISR Total | 8,621 | 0.05* | 8,914 | 2,353 | 0.05 | 2,226 |
| Company Total | 58,446 ('000 lbs. U308) 45,445 ('000 lbs. U308) | | | | 308) | |

⁽¹⁾ Cautionary Note to US Investors. The Company is without known mineral reserves under SEC Industry Guide 7. Measured, Indicated and Inferred Resources are estimated in accordance with NI 43-101 and do not constitute SEC Industry Guide 7 compliant reserves. (*) Weighted averages



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