

Peninsula Minerals

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Companies Announcement Office
Via Electronic Lodgement

FURTHER HIGH GRADE URANIUM INTERSECTED AT LANCE

Highlights

- Best grade of 4.5ft @ 1,210ppm U₃O₈ from hole RMRD0003
- Interval of 10.5 ft @ 700ppm U₃O₈ returned from hole RMR0015
- Drilling continues at Lance with all holes intersecting uranium mineralisation
- New geological information allows detailed correlation of the mineralised sand units vital for ISR planning

Summary

The rotary mud and core drilling program continues at the Ross Project Area (**Ross**) of the Lance projects in Wyoming, USA (**Lance**). To date twenty holes have been completed at Ross with all holes drilled intersecting uranium mineralisation. Holes RMRD0003 and RMR0012 intersected five mineralised zones over an interval averaging 17m thick (55 feet) highlighting the multiple stacked mineralised sands. U₃O₈ grades above 100ppm are listed in Table 1.

The new drilling results at Ross have enhanced the understanding of the project areas geology and mineralisation. The new level of detail relating to lithology, alteration and mineralisation was previously unavailable from the historical drilling. This detail is essential as Peninsula continues to move the project towards development of an ISR operation.

This Drilling Program will be followed up in 2009 with a larger scale drilling program to add to this understanding, progress production planning and facilitate preparation of a JORC compliant resource.

Drilling Program

The current rotary mud and core drilling program (**Drilling Program**) at Ross continues to confirm the historic uranium mineralisation and provide a framework for detailed geological interpretation and correlation of the mineralised sands. Three core holes have also been drilled to date to produce samples that will be used for detailed petrophysical and leachability testing. These tests will update the key parameters required for a successful ISR operation and complement the existing historic hydrological and metallurgical data.

The Drilling Program consists of 51 holes planned for 11,348m (37,230ft). Several holes in each area are being drilled to the footwall shale unit to test for up to five stacked mineralised sands that are interpreted to be present within the Ross area. The Drilling Program commenced on 12 September 2008 and to date 3,613m (11,855ft) has been drilled from the 20 completed holes. This includes three core holes.

The new drilling continues to confirm the historic mineralised intervals through gamma and PFN logging of all of the holes. A cluster of holes has been drilled in the northern portion of the Ross area to provide detailed geological and down-hole logging data to assess the continuity of mineralised sands and their shale/siltstone "breaks" which isolate the mineralised sand units from each other; a pre-requisite for ISR mining.

Drilling Program Results

All holes drilled to date in the program have intersected uranium mineralisation over a strike length of 1.5km out of the 2.9km of strike outlined in the historic drilling. As previously announced, Ross has an exploration target size of 6.35-9.52 million short tons at 0.05-0.07% eU_3O_8 for 8-12 million pounds of U_3O_8 ¹ within a global exploration target size for the Lance District of 39-60 million short tons at 0.05-0.07% eU_3O_8 for between 50-76 million pounds of U_3O_8 ¹. U_3O_8 grades above 100ppm are listed in Table 1 at the end of this report.

Of the twenty holes drilled to date, 12 holes contain separate mineralised intervals that exceed the 0.3 ft % U_3O_8 grade thickness product used as a "rule of thumb" for economic ISR mineralisation in this setting. Hole RMRD0003 intersected five mineralised zones in four separate sand units over a 15m (50ft) thickness. RMR0012 intersected five mineralised zones within three mineralised sands over an interval averaging 17m thick (55 ft). These two holes illustrate the stacking of the mineralised sands.

The holes containing lower grade intervals are also very encouraging as several intersections appear to be limb intersections, which provide a vector to nearby high grade "nose" mineralisation. The greater resolution of the new gamma and PFN down-hole logging tools compared to the historic 1970's gamma only logging is becoming apparent. Several historic broad low grades zones when logged with the PFN are being split up into thinner but higher grade zones within separate sand intervals.

Yours Sincerely



John (Gus) Simpson
Chairman

For further information, please contact our office on (08)9420 9333 during normal business hours.

Competent Person

The information in this report that relates to Exploration Results, Mineral Resources or Ore Reserves is based on information compiled by Jim Gullinger, Principal of independent consultants World Industrial Minerals who has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking as a Competent Person as defined in the 2004 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Mr Gullinger consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

¹Please note that the potential quantity and grade of the Exploration Targets in this presentation are conceptual in nature, that there has been insufficient exploration to define a Mineral Resource and that it is uncertain if further exploration will result in the determination of a Mineral Resource.

Table 1: Drill Hole details and U₃O₈ grades above 100ppm. Holes shown in black were reported previously

New Hole ID	Local Northing m	Local Easting m	Total Hole Depth ft	From ft	To ft	Intercept ft over PFN U ₃ O ₈ grade ppm	PFN GT (ft%) (0 .01% cut)
RMRD0001	90133	465563	720	568.00	585.00	17.5' @ 320	0.56
RMRD0002	91350	465778	500	454.57	456.75	2' @ 410	0.08
RMRD0003	91546	465754	560	437.75	439.75	2' @ 160	0.031
				441.25	452.75	11' @ 650	0.718
				461.75	463.75	2' @ 260	0.053
				472.25	473.75	1.5' @ 170	0.026
				474.75	479.25	4.5' @ 1,210	0.546
				484.75	488.25	3.5' @ 520	0.183
RMR0001	90271	465538	720	499.25	501.75	2.5' @ 250	0.063
				502.35	505.75	3.5' @ 440	0.15
				507.25	512.75	5.5' @ 310	0.17
RMR0002	90127	465590	730	545.50	548.00	3' @ 860	0.26
				554.50	562.50	8.5' @ 220	0.19
RMR0003	90133	465563	730	530.00	541.00	11' @ 460	0.51
RMR0004	90271	465588	660	500.00	513.00	13' @ 410	0.53
RMR0005	91347	465824	610	402.75	405.25	2.5' @ 820	0.21
				423.75	426.75	3' @ 700	0.21
				434.75	435.75	1' @ 130	0.01
RMR0006	90122	465595	620	533.75	540.75	7' @ 1,490	1.05
				549.75	553.25	3.5' @ 340	0.12
				557.75	559.75	1.5' @ 150	0.02
				570.75	574.75	4' @ 1,430	0.57
				575.75	580.25	5' @ 1,510	0.75
RMR0007	91355	465886	540	385.75	389.75	4' @ 420	0.168
				395.25	399.25	4' @ 200	0.08
RMR0008	91619	465859	620	434.75	451.20	16.5' @ 290	0.48
				453.25	458.75	5' @ 470	0.24
				460.75	467.75	7' @ 640	0.448

New Hole ID	Local Northing m	Local Easting m	Total Hole Depth ft	From ft	To ft	Intercept ft over PFN U ₃ O ₈ grade ppm	PFN GT (ft%) (0 .01% cut)
RMR0009	91514	465753	560	458.25 461.75 474.25 481.25	459.75 462.74 477.25 485.25	1.5' @ 200 1' @ 150 3' @ 250 4' @ 830	0.03 0.015 0.076 0.332
RMR0010	91538	465799	565	410.75 465.75 468.25 480.75	413.75 466.75 476.25 484.75	3' @ 240 1' @ 180 8' @ 300 4' @ 270	0.072 0.018 0.242 0.106
RMR0011	91565	465813	580	410.75 422.25 467.75 471.25	412.25 422.75 470.75 482.25	1.5' @ 130 0.5' @ 120 3' @ 180 11' @ 220	0.02 0.006 0.053 0.241
RMR0012	91562	465844	540	406.75 429.75 433.75 453.25 462.25	409.25 432.25 437.75 458.75 467.75	2.5' @ 250 2.5' @ 250 4' @ 760 5.5' @ 570 5.5' @ 270	0.061 0.063 0.305 0.315 0.149
RMR0013	91589	465858	540	432.25 442.25 450.25 453.25	435.75 443.75 451.75 467.00	3.5' @ 250 1.5' @ 150 1.5' @ 130 14' @ 300	0.089 0.022 0.02 0.419
RMR0014	91480	465770	500	449.25 453.75	451.25 464.50	1.5' @ 250 11' @ 420	0.037 0.461
RMR0015	91618	465827	520	436.75 454.25 457.25 460.25	441.75 455.25 459.25 470.75	5' @ 170 1' @ 220 2' @ 140 10.5' @ 700	0.087 0.022 0.028 0.732
RMR0016	91620	465797	520	453.25 465.75 473.75 481.25	456.25 472.25 477.75 482.25	3' @ 150 6.5' @ 610 4' @ 260 1' @ 120	0.045 0.396 0.104 0.012
RMR0017	91648	465800	520	463.25 475.25	464.75 478.25	1.5' @ 230 3' @ 780	0.023 0.233