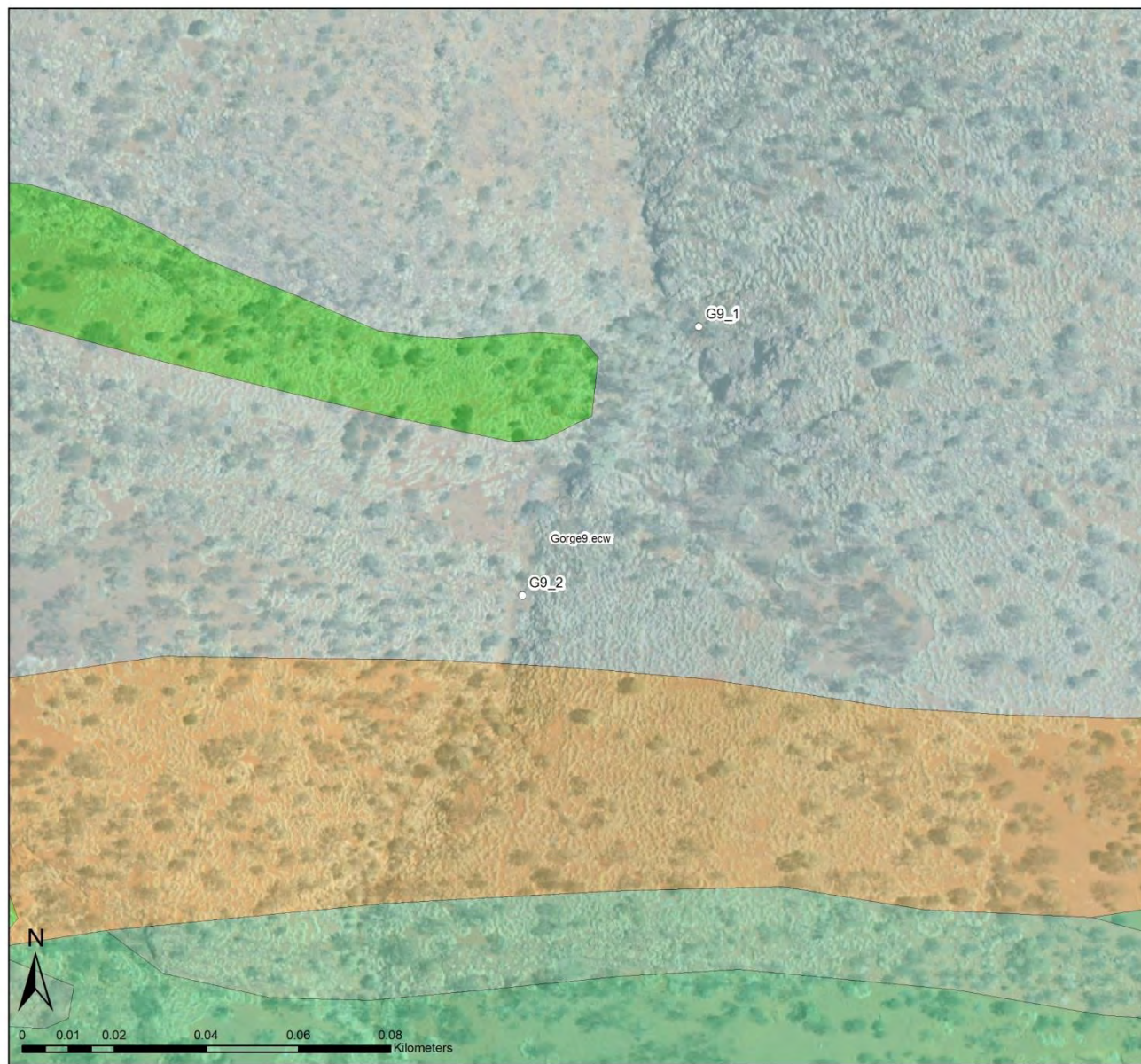


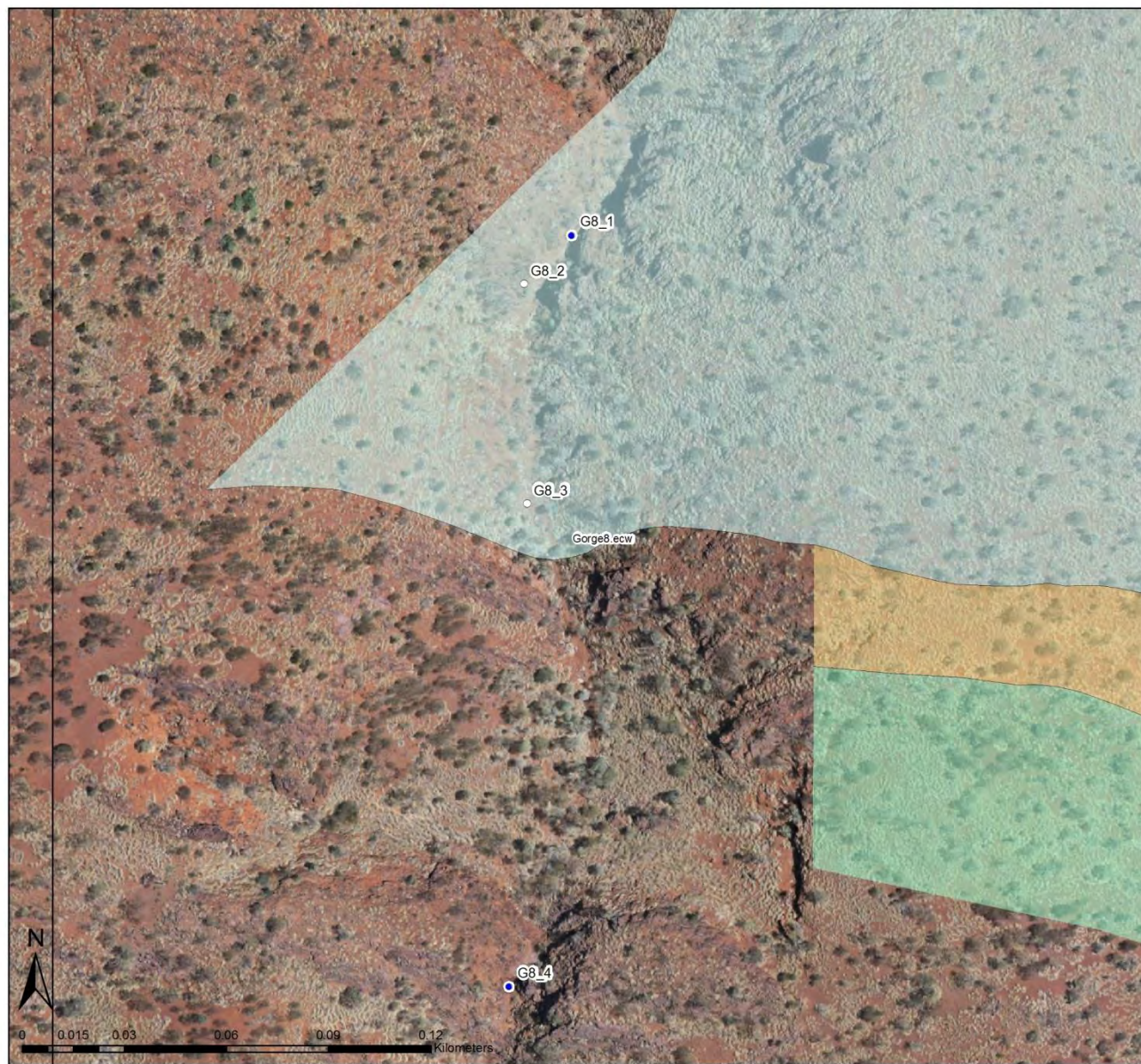
Legend

- Gorge_Labels
- Pools**
- Status**
- Unconfirmed Surface Water Pool
 - Confirmed Surface Water Pool
 - Confirmed Surface Water Pool* (general location only)
 - Para Channar Geology 10K - Bedding
 - Para Channar Geology 10K - Strat Boundary
 - Anticlinal Axis
 - Fault
 - Fault (definite)
 - Fault (interpreted)
 - Synclinal axis
 - Para Channar Geology 10K - Min Alteration
- Geological Units:**
- AFj
 - AHd
 - AHm
 - AHmn
 - AHmu
 - AHr
 - AHs
 - Cza
 - Czc
 - Czcg
 - Czd
 - Czk
 - Czl
 - Czu
 - PHbd
 - PHbj
 - PHbw
 - PHby
 - PHj
 - PHjd
 - PW
 - PWm
 - Pd
 - Qa
 - Qc
 - br



Legend

- Gorge_Labiles
- Pools**
- Status**
- Unconfirmed Surface Water Pool
- Confirmed Surface Water Pool
- Confirmed Surface Water Pool* (general location only)
- Para Channar Geology 10K - Bedding
- Para Channar Geology 10K - Strat Boundary
- ↕ Anticlinal Axis
- Fault
- Fault (definite)
- Fault (interpreted)
- ↕ Synclinal axis
- ▨ Para Channar Geology 10K - Min Alteration
- AFj
- AHd
- AHm
- AHmm
- AHmn
- AHmu
- Ahr
- AHs
- Cza
- Czc
- Czcg
- Czd
- Czk
- Czl
- Czu
- PHbd
- PHbj
- PHbw
- PHby
- PHj
- PHjd
- PW
- PWm
- Pd
- Qa
- Qc
- br



Legend

Gorge_Labels

Pools

Status

- Unconfirmed Surface Water Pool
- Confirmed Surface Water Pool
- Confirmed Surface Water Pool* (general location only)

Fault - questionable. Apparent movement known, dip

Fault - questionable. Movement or dip unknown

Fault. Apparent movement known, dip unknown

Fault. Movement or dip unknown

Fault. Movement or dip unknown, approximate

Quartz vein

Enrichment boundary

Geological boundary, approximate

Geological boundary, definite

Western Range - Brockman 44-55 West Geology 5k - Min Alteration

<all other values>

AHr

Czc

Czd

Czg

Czu

PHbd

PHbj

PHbw

PHby

PHj

PHjd

PWm

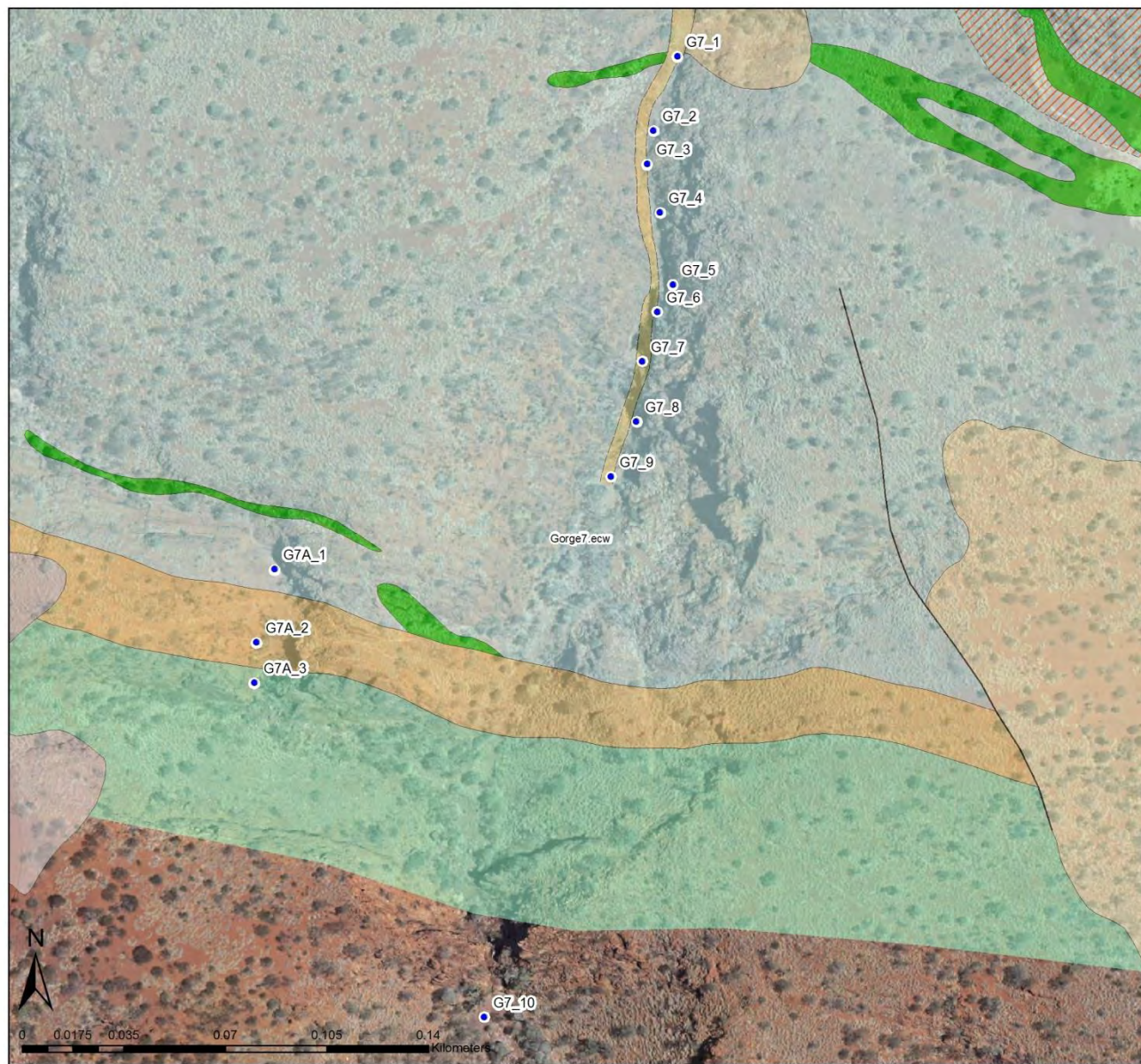
PWq

Pdd

Pdd?

Pds

Qa



Legend

Gorge_Lables

Pools

Status

- Unconfirmed Surface Water Pool
- Confirmed Surface Water Pool
- Confirmed Surface Water Pool* (general location only)

Fault - questionable. Apparent movement known, dip

Fault - questionable. Movement or dip unknown

Fault. Apparent movement known, dip unknown

Fault. Movement or dip unknown

Fault. Movement or dip unknown, approximate

Quartz vein

Enrichment boundary

Geological boundary, approximate

Geological boundary, definite

Western Range - Brockman 44-55 West Geology 5k - Min Alteration

<all other values>

Ahr

Czc

Czd

Czg

Czu

PHbd

PHbj

PHbw

PHby

PHj

PHjd

PWm

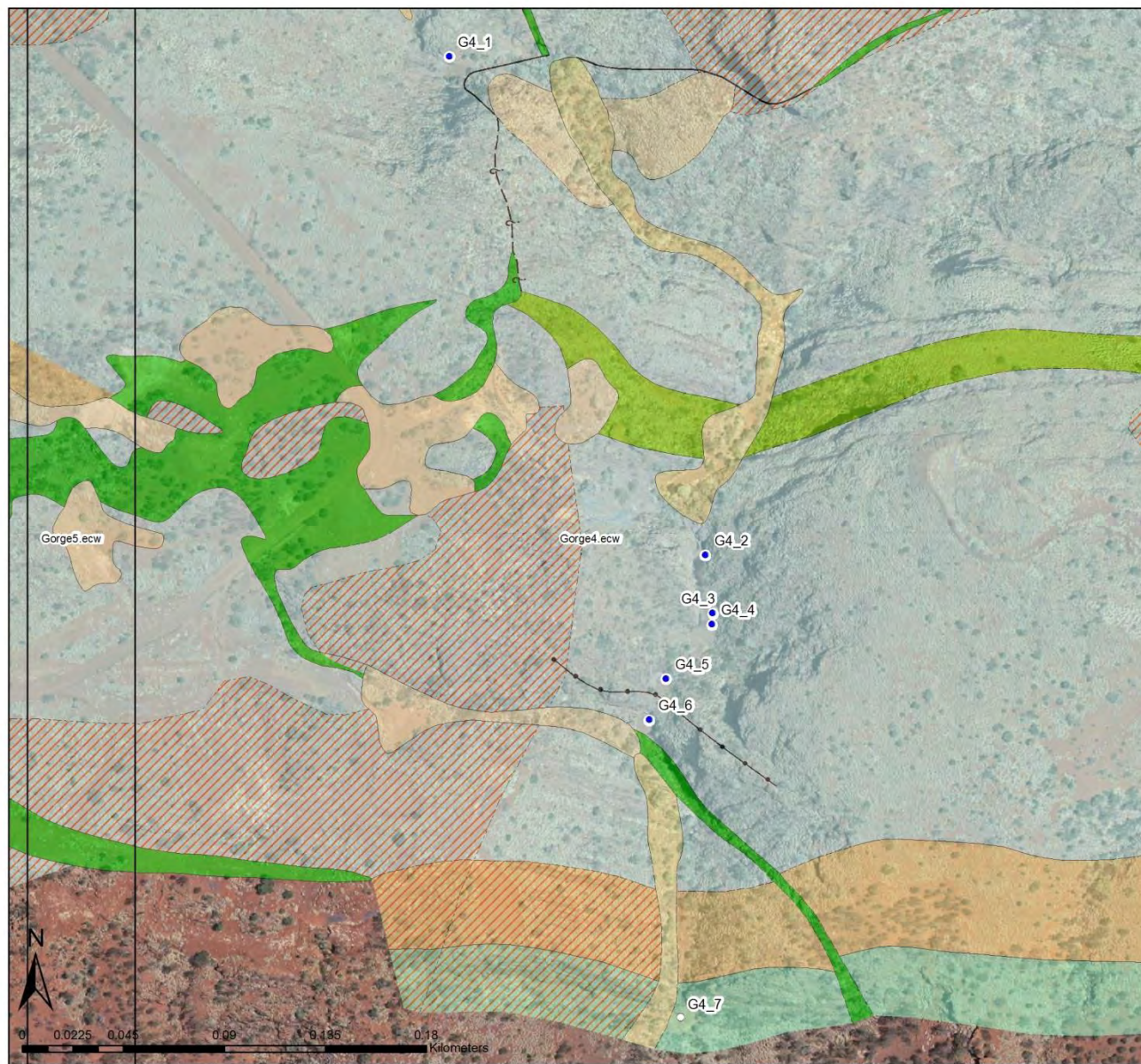
PWq

Pdd

Pdd?

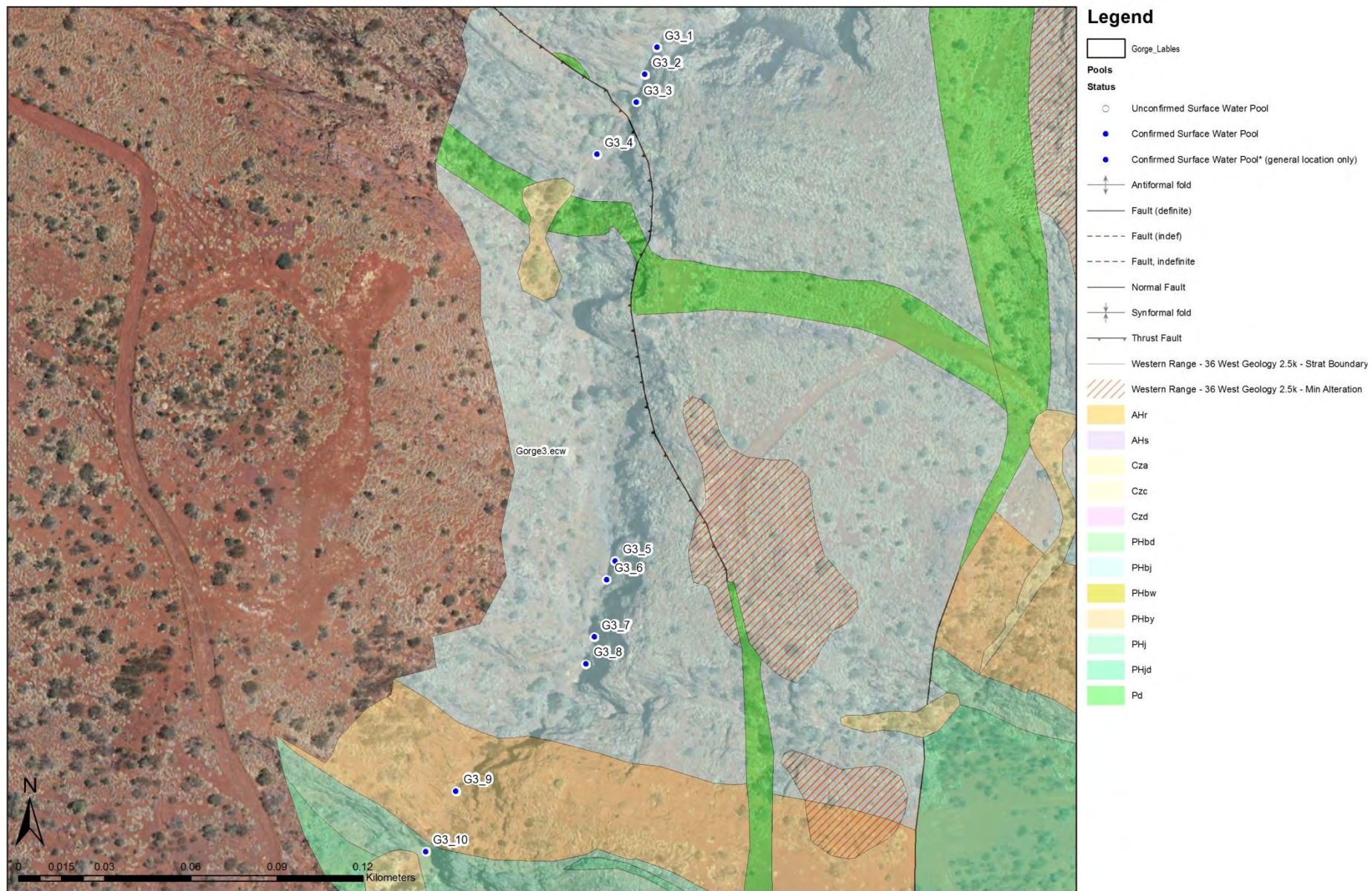
Pds

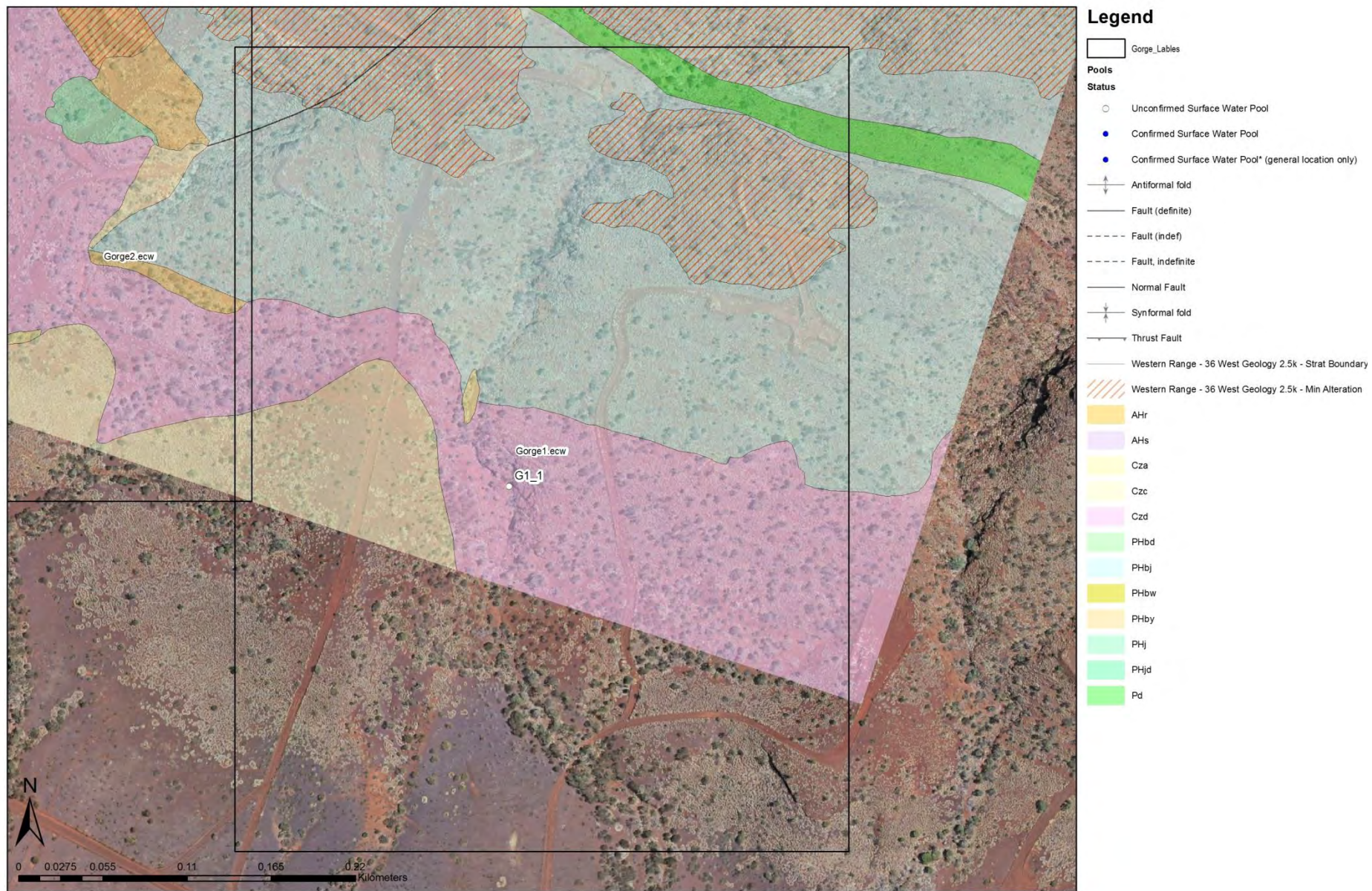
Qa



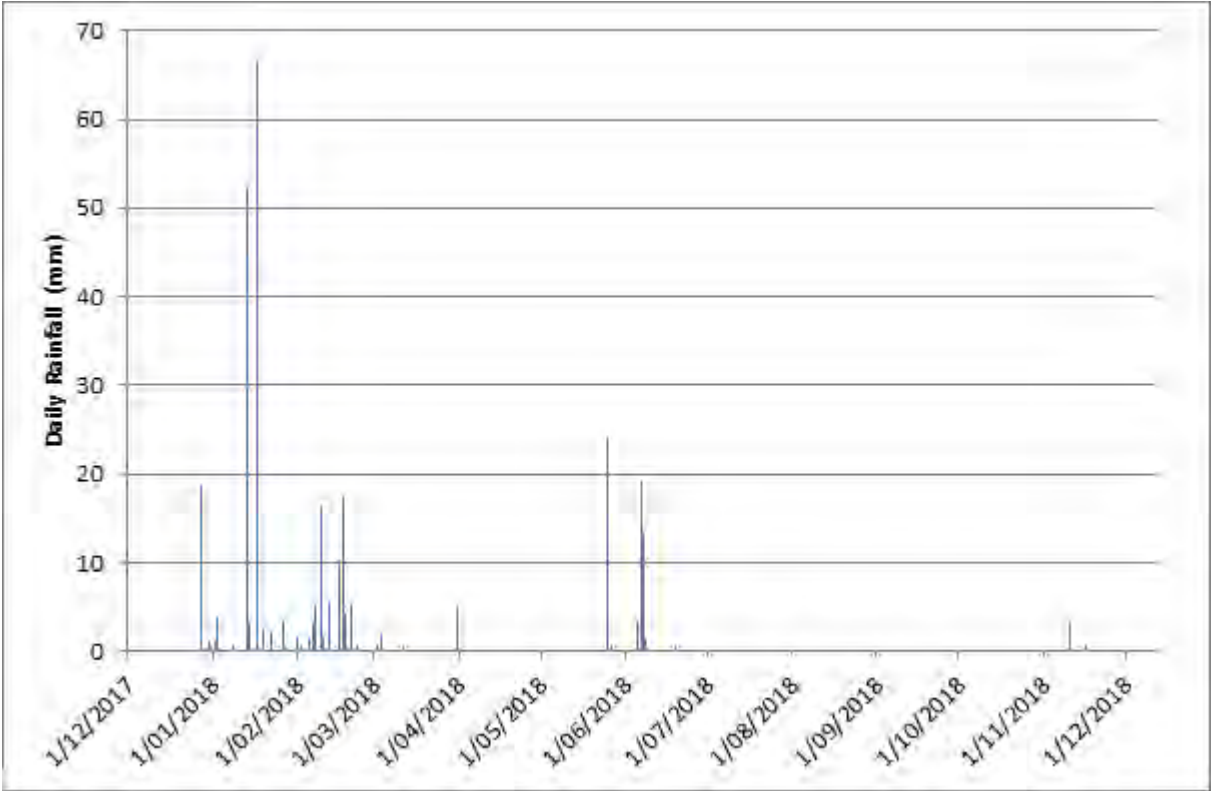
Legend

- Gorge_Labels
- Pools**
- Status**
- Unconfirmed Surface Water Pool
- Confirmed Surface Water Pool
- Confirmed Surface Water Pool* (general location only)
- Fault - questionable. Apparent movement known, dip
- Fault - questionable. Movement or dip unknown
- Fault. Apparent movement known, dip unknown
- Fault. Movement or dip unknown
- Fault. Movement or dip unknown, approximate
- Quartz vein
- Enrichment boundary
- Geological boundary, approximate
- Geological boundary, definite
- /// Western Range - Brockman 44-55 West Geology 5k - Min Alteration
- <all other values>
- AHr
- Czc
- Czd
- Czg
- Czu
- PHbd
- PHbj
- PHbw
- PHby
- PHj
- PHjd
- PWm
- PWq
- Pdd
- Pdd?
- Pds
- Qa





Appendix C – Daily Rainfall at Paraburdoo for 2018



Appendix D - Surface water features of the Western Range Summary Table

Gorge #	Pool #	Reference	Easting	Northing	Source	Pool Status	Impact Type	Likely Persistence
	1	UC_1	552013	7434780	Rio Tinto Heritage Layer	Unconfirmed	Negligible	very low - unconfirmed
	2	UC_2	538670	7437570	Rio Tinto Heritage Layer	Unconfirmed	Negligible	low - exposed short term
	3	UC_3	536680	7437290	Rio Tinto Heritage Layer	Unconfirmed	Negligible	low - exposed short term
1	1	G1_1	551100	7434230	Rio Tinto Heritage Layer	Unconfirmed	Negligible	low - exposed short term
3	1	G3_1	548500	7435840	aerial imagery	confirmed	Direct Impact	moderate - some persistence
3	2	G3_2	548496	7435830	aerial imagery	confirmed	Direct Impact	moderate - some persistence
3	3	G3_3	548493	7435820	Rio Tinto Heritage Layer	confirmed	Direct Impact	Very high - potentially permanent
3	4	G3_4	548479	7435800	Rio Tinto Heritage Layer	confirmed	Direct Impact	low - exposed short term
3	5	G3_5	548486	7435660	aerial imagery	confirmed	Direct Impact	low - exposed short term
3	6	G3_6	548483	7435650	aerial imagery	confirmed	Direct Impact	low - exposed short term
3	7	G3_7	548478	7435630	aerial imagery	confirmed	Direct Impact	low - exposed short term
3	8	G3_8	548476	7435620	aerial imagery	confirmed	Direct Impact	moderate - some persistence
3	9	G3_9	548430	7435580	aerial imagery	confirmed	Direct Impact	low - exposed short term
3	10	G3_10	548420	7435560	Rio Tinto Heritage Layer	confirmed	Catchment Reduction	Very high - potentially permanent
4	1	G4_1	547316	7436140	Rio Tinto Heritage Layer	confirmed	Catchment Reduction	moderate - some persistence
4	2	G4_2	547430	7435920	Rio Tinto Heritage Layer	confirmed	Catchment Reduction	moderate - some persistence
4	3	G4_3	547433	7435890	aerial imagery	confirmed	Catchment Reduction	low - exposed short term
4	4	G4_4	547433	7435890	aerial imagery	confirmed	Catchment Reduction	low - exposed short term
4	5	G4_5	547413	7435860	aerial imagery	confirmed	Catchment Reduction	low - exposed short term
4	6	G4_6	547405	7435850	aerial imagery	confirmed	Catchment Reduction	moderate - some persistence
4	7	G4_7	547419	7435710	Rio Tinto Heritage Layer	Unconfirmed	Catchment Reduction	low - exposed short term
7	1	G7_1	545342	7435990	Astron Pool 4	confirmed	Catchment Reduction	very high - potentially permanent
7	2	G7_2	545334	7435960	aerial imagery	confirmed	Catchment Reduction	moderate - some persistence
7	3	G7_3	545332	7435950	aerial imagery	confirmed	Catchment Reduction	moderate - some persistence
7	4	G7_4	545336	7435940	aerial imagery	confirmed	Catchment Reduction	moderate - some persistence
7	5	G7_5	545341	7435910	aerial imagery	confirmed	Catchment Reduction	moderate - some persistence

7	6	G7_6	545335	7435900	aerial imagery	confirmed	Catchment Reduction	high - semi permanent
7	7	G7_7	545330	7435880	Rio Tinto Heritage Layer & Astron Pool 5	confirmed	Catchment Reduction	Very high - potentially permanent
7	8	G7_8	545328	7435860	Rio Tinto Heritage Layer	confirmed	Catchment Reduction	low - exposed short term
7	9	G7_9	545319	7435840	aerial imagery	confirmed	Catchment Reduction	low - exposed short term
7	10	G7_10	545275	7435660	Rio Tinto Heritage Layer	confirmed	Catchment Reduction	moderate - some persistence
7	A1	G7A_1	545203	7435810	Rio Tinto Heritage Layer & Astron Pool 3	confirmed	Negligible	high - semi permanent
7	A2	G7A_2	545197	7435790	Rio Tinto Heritage Layer	confirmed	Negligible	moderate - some persistence
7	A3	G7A_3	545196	7435770	Rio Tinto Heritage Layer	confirmed	Negligible	moderate - some persistence
8	1	G8_1	544200	7436100	aerial imagery	confirmed	Minor Catchment Reduction	low - exposed short term
8	2	G8_2	544186	7436090	Rio Tinto Heritage Layer	Unconfirmed	Minor Catchment Reduction	low - exposed short term
8	3	G8_3	544187	7436020	Rio Tinto Heritage Layer	Unconfirmed	Minor Catchment Reduction	low - exposed short term
8	4	G8_4	544182	7435880	Rio Tinto Heritage Layer	confirmed	Minor Catchment Reduction	low - exposed short term
9	1	G9_1	543696	7436110	Rio Tinto Heritage Layer	Unconfirmed	Minor Catchment Reduction	low - exposed short term
9	2	G9_2	543658	7436050	Rio Tinto Heritage Layer	Unconfirmed	Minor Catchment Reduction	low - exposed short term
11	1	G11_1	542705	7436100	Rio Tinto Heritage Layer	Unconfirmed	Minor Catchment Reduction	low - exposed short term
11	2	G11_2	542695	7436080	Rio Tinto Heritage Layer	Unconfirmed	Minor Catchment Reduction	low - exposed short term
12	1	G12_1	542120	7436260	Astron Pool 2	confirmed	Catchment Reduction	high - semi permanent
12	2	G12_2	542119	7436240	Astron Pool 1	confirmed	Catchment Reduction	high - semi permanent
12	3	G12_3	542105	7436200	Rio Tinto Heritage Layer	Unconfirmed	Catchment Reduction	low - exposed short term
12	4	G12_4	542135	7436160	Aerial Imagery	Unconfirmed	Catchment Reduction	low - exposed short term
13	1	G13_1	541664	7437110	WRE_May 18 targets	Unconfirmed	Direct Impact	very low - unconfirmed
13	2	G13_2	541654	7436680	Rio Tinto Heritage Layer	Unconfirmed	Direct Impact	low - exposed short term

13	3	G13_3	541550	7436540	WRE_May 18 targets	confirmed	Direct Impact	low - exposed short term
13	4	G13_4	541504	7436500	Rio Tinto Heritage Layer	confirmed	Direct Impact	low - exposed short term

Appendix E – Water Feature Photos

Gorge 3



Pool G3_10 Looking Upstream (April 2018)



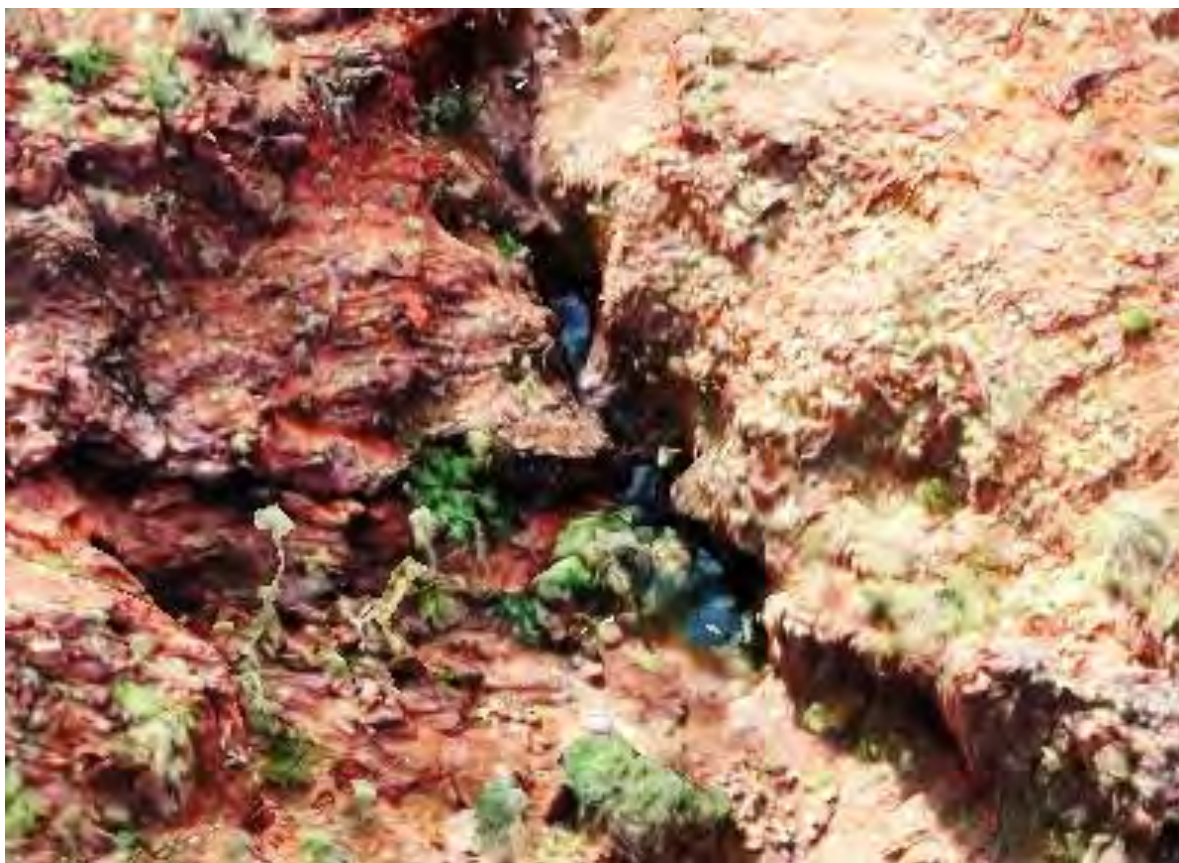
Pool G3_10 Looking Upstream (May 2018)



Pool G3_10 From Drone Survey (June 2018)



Pool G3_10 Taken from Adjacent Ridge, May 2018



Pool G3_10 From Drone Survey (June 2018)



Pool G3_10 During Water Sampling in October 2018

Gorge 7



Pool G7_7 Looking North, from February 2018



Pool G7_7 Looking East, from February (top), April (middle) and May (bottom) of 2018



Pool G7A_3 Wet (Top image, looking upstream, February 2018) and Dry (bottom image, looking downstream, April 2018)



Wet conditions at Pool G7_10 (top image, February 2018) versus Dry (bottom image, April 2018)

Gorge 9



Pool G9_1 in October 2018

Gorge 12



Wet Conditions at Pool G12_1 in February (Left) versus dry in April (right) 2018

Gorge 13



Dry Conditions (Dec 2017) Gorge 13 Pool 1 (G13_1) Looking Upstream



Wet Conditions (Feb 2018) Gorge 13 Pool 1 (G13_1) Upstream is right hand side

Six Mile Creek Tributary



Six Mile Creek Tributary showing a 2 metre (approx.) bank height



Undulating bed of Six Mile Creek with large pebbles indicating armouring against high velocity flows