

# Appendix 4C

## Quarterly report for entities admitted on the basis of commitments

Introduced 31/03/00 Amended 30/09/01, 24/10/05, 17/12/10

Name of entity

**4DS MEMORY LIMITED (4DS)**

ABN

45 145 590 100

Quarter ended ("current quarter")

**30 June 2016**

### Consolidated statement of cash flows

	Current quarter \$A'000	Year to date (12 Months) \$A'000
<b>Cash flows related to operating activities</b>		
1.1 Receipts from product sales and related debtors	-	50
1.2 Payments for:		
(a) staff costs	(43)	(145)
(b) research & development	(317)	(1,340)
(c) leased assets	-	-
(d) other working capital	(238)	(987)
1.3 Dividends received		-
1.4 Interest and other items of a similar nature received	8	23
1.5 Interest and other costs of finance paid	-	-
1.6 Income taxes paid	-	-
1.7 Other	-	-
<b>Net Operating Cash Flows</b>	<b>(590)</b>	<b>(2,399)</b>
<b>Cash flows related to investing activities</b>		
1.8 Payment for acquisition of:		
(a) businesses	-	-
(b) equity investments	-	-
(c) other non-current assets	-	(9)
1.9 Proceeds from disposal of:		
(a) businesses	-	-
(b) equity investments	-	-
(c) other non-current assets	-	-
1.10 Loans to other entities	-	-
1.11 Other	-	-
<b>Net Investing Cash Flows</b>	<b>-</b>	<b>(9)</b>

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<b>Net Investing Cash Flows</b>	-	(9)
1.13 Total operating and investing cash flows (brought forward)	(590)	(2,408)
<b>Cash flows related to financing activities</b>		
1.14 Proceeds from issues of shares and convertible notes	-	579
1.15 Payments for capital raisings costs	-	-
1.16 Proceeds from borrowings	-	-
1.17 Repayment of borrowings	-	(26)
1.18 Dividends paid	-	-
1.19 Other – cash acquired on acquisition of business - refer Note One below	-	3,084
<b>Net financing cash flows</b>	-	3,637
<b>Net (decrease)/ increase in cash held</b>	(590)	1,229
1.20 Cash at beginning of quarter/year to date	1,833	9
1.21 Exchange rate adjustments to item 1.20	-	5
1.22 <b>Cash at end of quarter</b>	1,243	1,243

**Note One:** Prior to the acquisition of 4D-S Pty Ltd, 4DS Memory raised capital of \$2,750,000, this amount net of costs along with the existing cash balance of 4DS Memory formed part of the cash balance on acquisition as a result of reverse acquisition accounting. Detailed disclosures are available in the Interim Financial Report for the Half Year Ended 31 December 2015.

**Payments to directors of the entity and associates of the directors**  
**Payments to related entities of the entity and associates of the related entities**

	Current quarter \$A'000
1.23 Aggregate amount of payments to the parties included in item 1.2 and 1.15	84
1.24 Aggregate amount of loans to the parties included in item 1.10	-

1.25 Explanation necessary for an understanding of the transactions

Payment to related parties relate to:  
- Executive and non-executive fees

**Non-cash financing and investing activities**

2.1 Details of financing and investing transactions which have had a material effect on consolidated assets and liabilities but did not involve cash flows

Nil

2.2 Details of outlays made by other entities to establish or increase their share in projects in which the reporting entity has an interest

Nil

### Financing facilities available

Add notes as necessary for an understanding of the position.

	Amount available \$A'000	Amount used \$A'000
3.1 Loan facilities	-	-
3.2 Credit standby arrangements	-	-

### Reconciliation of cash

Reconciliation of cash at the end of the quarter (as shown in the consolidated statement of cash flows) to the related items in the accounts is as follows.	Current quarter \$A'000	Previous quarter \$A'000
4.1 Cash on hand and at bank	1,243	1,833
4.2 Deposits at call	-	-
4.3 Bank overdraft	-	-
4.4 Other (provide details)	-	-
<b>Total: cash at end of quarter (item 1.22)</b>	<b>1,243</b>	<b>1,833</b>

### Acquisitions and disposal of business entities

	Acquisitions (Item 1.9(a))	Disposals (Item 1.10(a))
5.1 Name of entity	-	-
5.2 Place of incorporation or registration	-	-
5.3 Consideration for acquisition or disposal	-	-
5.4 Total net assets	-	-
5.5 Nature of business	-	-

### Performance Shares

Number of Class 1 Performance Shares at the beginning of the quarter was 67,604,019.

No Class 1 Performance Shares were converted or cancelled during the quarter.

No Class 1 Performance Share milestones were met during the quarter.

The Class 1 Performance Shares are shares that will each convert into Shares on a one for one basis upon satisfaction of a performance milestone, being 4DS announcing that the Expert has delivered a report to 4DS confirming that it has achieved "endurance consistency" (the **Milestone**). Endurance consistency will be achieved on the first successful duplication of POR cells in two wafers on one or more lots (that are different lots from the lot that defines the POR), as measured by either:

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- *linear scale endurance yields for 400 cycles where the state current is read after each cycle; or*
- *logarithmic scale endurance yields for 10,000 cycles where the state current is read 4 times per decade,*

*that are higher than or equal to 90% for each of the 2 wafers when including all POR cells with sizes up to 3 times the smallest cell size in at least 2 die per wafer.*

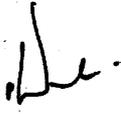
*The Class 1 Performance Shares expire on 31 December 2018. To the extent that the Milestone has not been achieved on or before the expiry date, then the Class 1 Performance Shares will automatically consolidate to a nominal number and convert on a one for one basis to a nominal number of Shares.*

*On the basis that the Milestone is drafted with reference to technical criteria which may be outside the scope of expertise of most investors and analysts, ASX requires 4DS to provide the following "plain English" summary of the terms and conditions of the Milestone, so that ordinary investors and analysts can more readily understand the circumstances in which the Milestone will be taken to have been met:*

- *All silicon products used in mobile devices (smartphones, tablets, laptops) and data centres (cold storage and the cloud) are very complex high-volume semiconductor products that need a very high degree of manufacturing consistency and operating consistency to be profitable for the chip maker and affordable for the chip buyer.*
- *Today's high-density memory chips contain billions of memory cells together with the control circuits to select certain cells, read their state ("0" or "1"), or write a different state. The smaller the cells, the more data that can be packed into a single chip. Many memory chips are manufactured together on a wafer through a complex sequence of depositing super thin materials and etching away certain sections of these depositions. When all process steps are completed, the wafer is cut into lots of individual memory chips which are then tested, packaged and sold.*
- *4DS's initial focus was to establish a baseline process that could manufacture individual memory cells of various sizes that perform the desired function consistently cell-to-cell on the same wafer and on wafers in the same lot (manufactured together). The first goal was to demonstrate that 4DS had a repeatable process that could manufacture cells on wafers in a new lot that behave very similar to cells on wafers manufactured in an earlier lot (ie, lot-to-lot consistency).*
- *Having achieved, lot-to-lot consistency, 4DS's focus is to gradually improve the process in incremental steps to improve the fundamental behaviour of the cell (reading, writing, storing) while maintaining lot-to-lot consistency. The Milestone is specifically focused on 4DS ReRAM cells reaching a certain endurance level: how many times the state of the cell can be changed reliably from a "0" to a "1".*
- *4DS has entered into the Joint Development Agreement with HGST Netherlands B.V., to investigate the scaling of 4DS ReRAM cells to small cell geometries for memory applications.*
- *Following the achievement of the Milestone, 4DS will be well positioned to develop arrays of cells, and test chips.*
- *The Milestone is further detailed in the necessary technical terms in the full terms and conditions of the Class 1 Performance Shares to ensure that the Milestone can be verified and audited using clear metrics by an independent expert.*

## Compliance statement

- 1 This statement has been prepared under accounting policies which comply with accounting standards as defined in the Corporations Act or other standards acceptable to ASX.
- 2 This statement does give a true and fair view of the matters disclosed.



Signed: \_\_\_\_\_

Dated: 30 July 2016

Company Secretary

Print name: Peter Webse

### Notes

- 1 The quarterly report provides a basis for informing the market how the entity's activities have been financed for the past quarter and the effect on its cash position. An entity wanting to disclose additional information is encouraged to do so, in a note or notes attached to this report.
- 2 The definitions in, and provisions of, AASB 107: Statement of Cash Flows apply to this report except for any additional disclosure requirements requested by AASB 107 that are not already itemised in this report.
- 3 Accounting Standards. ASX will accept, for example, the use of International Financial Reporting Standards for foreign entities. If the standards used do not address a topic, the Australian standard on that topic (if any) must be complied with.

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