

NOTICE OF FILING

Details of Filing

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File Title:	Vince Impiombato, and Klemweb Nominees Pty Ltd as trustee for the Klemweb Superannuation Fund v BHP Group Ltd
Registry:	VICTORIA REGISTRY - FEDERAL COURT OF AUSTRALIA



A handwritten signature in blue ink, reading "Sia Lagos".

Registrar

Important Information

This Notice has been inserted as the first page of the document which has been accepted for electronic filing. It is now taken to be part of that document for the purposes of the proceeding in the Court and contains important information for all parties to that proceeding. It must be included in the document served on each of those parties.

The date of the filing of the document is determined pursuant to the Court's Rules.



Form 17

Rule 8.05(1)(a)

Second ~~Third~~ Further Amended Consolidated Statement of Claim

(Amended on 25 March 2025 pursuant to leave granted by order 2 of the orders of Justice Moshinsky made on 24 March 2025 ~~Amended on 16 October 2024 pursuant to leave granted in order 4(a) of the orders made on 29 August 2024~~)

No. VID 649 of 2018

Federal Court of Australia

District Registry: Victoria

Division: General

VINCE IMPIOMBATO, AND KLEMWEB NOMINEES PTY LTD (AS TRUSTEE FOR THE KLEMWEB SUPERANNUATION FUND)

Joint Representative Applicants

BHP GROUP LIMITED

(ACN 004 028 077)

Respondent

A. THE JOINT APPLICANTS AND GROUP MEMBERS

1. Vince Impiombato (**Impiombato**) and Klemweb Nominees Pty Ltd (as trustee for the Klemweb Superannuation Fund) (**Klemweb**) commence this proceeding as joint representative applicants (**Joint Applicants**) pursuant to Part IVA of the *Federal Court of Australia Act 1976* (Cth) on their own respective behalves and on behalf of the Group Members.

Filed on behalf of (name & role of party)	The Joint Applicants, Vince Impiombato and Klemweb Nominees Pty Ltd (as trustee for the Klemweb Superannuation Fund)
Prepared by (name of person/lawyer)	Cameron Myers and Lee Taylor
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2. Klemweb:
 - (a) is incorporated pursuant to the *Corporations Act 2001* (Cth) (**Corporations Act**) and is capable of suing in its own name; and
 - (b) brings this proceeding in its capacity as trustee for the Klemweb Superannuation Fund.
3. The Joint Applicants and the persons they represent (the **Group Members**) are all persons who or which:
 - (a) during the period from 8 August 2012 to the close of trade on 9 November 2015 inclusive (**Relevant Period**) entered into a contract (whether themselves or by an agent or trustee) to acquire an interest in fully paid up ordinary shares in:
 - (i) the Respondent, formerly BHP Billiton Limited (**BHP Ltd**); and/or
 - (ii) BHP Group Plc, formerly BHP Billiton Plc (**BHP Plc**), a company registered in England and Wales;

Particulars

Particulars of Impiombato's shareholdings during the Relevant Period are set out in Annexure A to this statement of claim.

Particulars of Klemweb's shareholdings during the Relevant Period are set out in Annexure B to this statement of claim.

Particulars of the shareholdings of the Group Members in the Relevant Period will be provided after the trial of the common questions.

- (b) were not during any part of the Relevant Period, and are not, any of the following:
 - (i) a director or officer or a close associate (as defined by s 9 of the Corporations Act) of BHP Ltd;
 - (ii) a related party (as defined by s 228 of the Corporations Act) of BHP Ltd;
 - (iii) a related body corporate (as defined by s 50 of the Corporations Act) of BHP Ltd;
 - (iv) an associated entity (as defined by s 50AAA of the Corporations Act) of BHP Ltd;
 - (v) a Justice, Registrar, District Registrar or Deputy District Registrar of the Federal Court of Australia or the High Court of Australia; or
 - (vi) an officer or employee of Maurice Blackburn Lawyers or Phi Finney

McDonald, or a legal representative engaged by Maurice Blackburn Lawyers or Phi Finney McDonald in this proceeding; and

- (c) are alleged to have suffered loss or damage by, or which resulted from, the conduct of BHP Ltd as pleaded in this statement of claim.

- 4. As at the date of the commencement of this proceeding, there are more than seven Group Members.

B. BHP LTD

- 5. BHP Ltd:

- (a) is and at all material times was a corporation incorporated under the Corporations Act and capable of being sued;
- (b) is and at all material times was a corporation listed on the Australian Securities Exchange (**ASX**), a financial market operated by ASX Limited;
- (c) at all material times had on issue ordinary shares (**BHP Ltd Shares**) that were:
 - (i) quoted on the ASX under the designation “BHP”;
 - (ii) ED securities for the purposes of s 111AE of the Corporations Act;
 - (iii) quoted ED securities within the meaning of s 111AM of the Corporations Act;
 - (iv) a financial product within the meaning of s 763A(1)(a) and s 764A(1)(a) of the Corporations Act and ss 12BAA(1)(a) and (7)(a) of the *Australian Securities and Investments Commission Act 2001* (Cth) (**ASIC Act**);
 - (v) able to be acquired and sold by investors and potential investors in BHP Ltd Shares on, inter alia, the ASX (**BHP Ltd Share Markets**).

Particulars

All ordinary shares in BHP Ltd (ie, all BHP Ltd Shares) were quoted on the ASX and were able to be acquired and sold by investors and potential investors on the ASX and/or on other financial markets or trading platforms, such as Chi-X Australia, or by other means of trading, such as off market trades.

- (d) is and was at all material times a listed disclosing entity within the meaning of s 111AL(1) of the Corporations Act;
- (e) is and was at all material times subject to and bound by the Listing Rules of the ASX (**ASX Listing Rules**);

- (f) is and was at all material times subject to the requirements of s 674 of the Corporations Act;
- (g) is and at all material times was a trading corporation within the meaning of the ASIC Act;
- (h) is and at all material times was a person within the meaning of:
 - (i) s 1041H of the Corporations Act; and
 - (ii) s 12DA of the ASIC Act.

C. BHP LTD'S CONTINUOUS DISCLOSURE OBLIGATIONS

- 6. At all material times, the ASX was a market operator of a listing market, namely the ASX's financial market, in relation to the BHP Ltd Shares, for the purposes of s 674(1) of the Corporations Act.
- 7. At all material times:
 - (a) BHP Ltd was obliged by s 111AP(1) and/or s 674(2) of the Corporations Act and/or Rule 3.1 of the ASX Listing Rules, once it became aware of any information concerning BHP Ltd that a reasonable person would expect to have a material effect on the price or value of BHP Ltd Shares, to tell the ASX that information immediately, unless any of the exceptions in Rule 3.1A of the ASX Listing Rules applied; and
 - (b) from the start of the Relevant Period until 30 April 2013, pursuant to Rule 19.12 of the ASX Listing Rules, BHP Ltd was taken to become aware of information if a director or executive officer of BHP Ltd had, or ought reasonably to have, come into the possession of the information in the course of the performance of their duties as a director or executive officer of BHP Ltd; and
 - (c) from 1 May 2013 to the end of the Relevant Period, pursuant to Rule 19.12 of the ASX Listing Rules, BHP Ltd was taken to become aware of information if, and as soon as, an officer of BHP Ltd had, or ought reasonably to have, come into possession of the information in the course of the performance of their duties as an officer of BHP Ltd.

D. BHP PLC

- 8. At all material times, BHP Plc has had on issue:
 - (a) ordinary shares (**BHP Plc Shares**) which were:

- (i) listed on the London Stock Exchange (**LSE**), a financial market operated by the London Stock Exchange Group Plc, under the designation “BLT”;
- (ii) also listed on the Johannesburg Stock Exchange (**JSE**), a financial market operated by the Johannesburg Stock Exchange Limited, under the designation “BIL”; and
- (iii) able to be acquired and sold by investors and potential investors in BHP Plc Shares on, inter alia, the LSE and the JSE (**BHP Plc Share Markets**).

Particulars

All ordinary shares in BHP Plc (ie, BHP Plc Shares) were listed on the LSE and on the JSE and were able to be acquired and sold by investors and potential investors on the LSE, JSE and/or other financial markets or trading platforms, such as BATS Chi-X Europe, or by other means of trading, such as off market trades.

E. BHP GROUP

E.1 DLC Structure and Management

- 9. At all material times, BHP Ltd and BHP Plc had a dual listed company structure (**DLC Structure**).

Particulars

DLC Structure Sharing Agreement, recital A and cl 2.

- 10. Pursuant to the DLC Structure, BHP Ltd and BHP Plc operated as if they were a single unified economic entity (**BHP**) through:
 - (a) identical boards of directors which comprised the same individuals (**BHP Board**); and

Particulars

DLC Structure Sharing Agreement, cl 2(b).

- (b) a single unified management team; including a single Group Management Committee, being BHP’s most senior executive body (**BHP GMC**);

Particulars

BHP annual report for the 2011 financial year (FY) (being the period between 1 July 2010 and 30 June 2011), page 127; BHP FY2012 annual report, page 131; BHP FY2013 annual report, page 151; BHP FY2014 annual report, page 172; BHP FY2015 annual report, page 160.

At all material times, the purpose of the BHP GMC was inter alia to: (i) assist the

Chief Executive Officer in pursuing BHP's corporate purpose; (ii) provide leadership to the BHP Group, determine its priorities and guide its operations; and (iii) provide a forum to debate high-level matters and ensure consistent development of the BHP Group's strategy.

- (c) the economic and voting interests in BHP resulting from holding one share in BHP Ltd were equivalent to the economic and voting interests resulting from holding one share in BHP Plc.

Particulars

DLC Structure Sharing Agreement, cl 3.

E.2 BHP Ltd Officers

11. Mr Marcus Randolph (**Randolph**) was:

- (a) from around 11 July 2007 to around 10 May 2013, a member of the BHP GMC;
- (b) from around 11 July 2007 to around 10 May 2013, Chief Executive of the Ferrous & Coal division of BHP;
- (c) by reason of the above:
 - (i) at all times during the Relevant Period up to 1 May 2013, an executive officer of BHP Ltd; and
 - (ii) at all times at and from 1 May 2013 until around 10 May 2013, an officer of BHP Ltd,

within the meaning of Rule 19.12 of the ASX Listing Rules.

12. Mr Ian Ashby (**Ashby**) was:

- (a) from around 1 March 2005 to 29 March 2012, President, Iron Ore, at BHP;
- (b) by reason of the above, at all times during the Relevant Period up to around 29 March 2012, an executive officer of BHP Ltd within the meaning of Rule 19.12 of the ASX Listing Rules.

13. Mr Jimmy Wilson (**Wilson**) was:

- (a) from around 30 March 2012 to around 29 February 2016, President, Iron Ore, at BHP;
- (b) from around 10 May 2013 to around 29 February 2016, a member of the BHP GMC;

- (c) by reason of the above:
 - (i) at all times during the Relevant Period up to 1 May 2013, an executive officer of BHP Ltd; and
 - (ii) at all times at and from 1 May 2013 until the end of the Relevant Period an officer of BHP Ltd,

within the meaning of Rule 19.12 of the ASX Listing Rules.

14. Mr Jeffrey Zweig (**Zweig**) was:

- (a) from around 24 February 2012 to around 31 October 2014, Vice President, Strategy and Development in the Iron Ore division of BHP;
- (b) by reason of the above:
 - (i) at all times during the Relevant Period up to 1 May 2013, an executive officer of BHP Ltd; and
 - (ii) at all times at and from 1 May 2013 until around 31 October 2014, an officer of BHP Ltd,

within the meaning of Rule 19.12 of the ASX Listing Rules.

15. Ms Margaret Beck (**Beck**) was:

- (a) from around September 2013 to around March 2016, Vice President, Finance, in the Iron Ore division of BHP;
- (b) by reason of the above, at all times from around September 2013 to the end of the Relevant Period, an officer of BHP Ltd within the meaning of Rule 19.12 of the ASX Listing Rules.

16. Mr Sérgio Consoli Fernandes (**Fernandes**) was:

- (a) from around 30 May 2012 to around 21 September 2015, General Manager, Business Development Brazil & Americas (Iron Ore) at BHP;
- (aa) from around 22 September 2015 to the end of the Relevant Period, Director Samarco JV (Samarco) for BHP;
- (b) by reason of the above:
 - (i) at all times from the start of the Relevant Period up to 1 May 2013, an executive officer of BHP Ltd; and

- (ii) at all times at and from 1 May 2013 up to around the end of the Relevant Period, an officer of BHP Ltd,
- within the meaning of Rule 19.12 of the ASX Listing Rules.

16A. Mr Antonio 'Tony' Ottaviano (**Ottaviano**) was:

- (a) at all times during the Relevant Period, Vice President of Strategy, Development and Planning at BHP;
 - (b) by reason of the above:
 - (i) at all times during the Relevant Period up to 1 May 2013, an executive officer of BHP Ltd; and
 - (ii) at all times at and from 1 May 2013 up to around the end of the Relevant Period, an officer of BHP Ltd,
- within the meaning of Rule 19.12 of the ASX Listing Rules.

16B. Mr Chris Corless (**Corless**) was:

- (a) at all times during the Relevant Period until about May 2015, Head of Risk and Governance in the Iron Ore division of BHP;
 - (b) by reason of the above:
 - (i) at all times from during the Relevant Period up to 1 May 2013, an executive officer of BHP Ltd; and
 - (ii) at all times at and from 1 May 2013 up to around May 2015, an officer of BHP Ltd,
- within the meaning of Rule 19.12 of the ASX Listing Rules.

16C. Mr Christopher Michael Campbell (**Campbell**) was:

- (a) from around January 2012 to around July 2013, Head of Group Public Affairs at BHP;
- (b) by reason of the above:
 - (i) at all times during the Relevant Period up to 1 May 2013, an executive officer of BHP Ltd; and

- (ii) at all times at and from 1 May 2013 up to around July 2015, an officer of BHP Ltd,

within the meaning of Rule 19.12 of the ASX Listing Rules.

- 17. At all material times, each of the members of the BHP GMC was an executive officer and/or an officer of BHP Ltd for the purposes of ASX Listing Rule 19.12 (as in force at the relevant time).
- 18. By reason of paragraphs 11 to 17 above, any information of which any of the persons referred to in those paragraphs became aware or which ought reasonably have come into their possession, in the course of carrying out their duties, was information of which BHP Ltd was aware within the meaning of Rule 3.1 and Rule 19.12 of the ASX Listing Rules.

F. BHP'S SAMARCO ASSET

- 19. At all material times, BHP carried on a business of exploration and production of minerals, including of iron ore, copper and coal, and of exploration, production and refining of petroleum.
- 20. At all material times, BHP's operating model had:
 - (a) from August 2012 to May 2013, eight business units comprising Petroleum; Aluminium and Nickel; Base Metals; Diamonds and Specialty Products; Iron Ore; Manganese; Metallurgical Coal; and Energy Coal;
 - (b) from May 2013 to May 2015, five business units comprising Petroleum and Potash; Copper; Iron Ore; Coal; and Aluminium, Manganese and Nickel;
 - (c) from May 2015, four business units comprising Petroleum and Potash; Copper; Iron Ore; Coal; and
 - (d) a business unit with primary responsibility for BHP's iron ore business (the **Iron Ore Business**).
- 21. At all material times, BHP's iron ore assets in the Iron Ore Business comprised the Western Australia Iron Ore business, and a 50% interest in Samarco Mineração S.A. (**Samarco**).

Particulars

- i. Samarco is and was at all material times a company registered in the Federative Republic of Brazil (**Brazil**).*
- ii. BHP Billiton Brasil Ltda (**BHP Brasil**), a wholly owned subsidiary of BHP, registered in Brazil, has at all material times held 50% of the shares in Samarco.*
- iii. Vale S.A. (**Vale**), a company registered in Brazil, has at all material times held the other 50% of the shares in Samarco.*
- iv. BHP has at all material times, through BHP Brasil, operated Samarco as a joint venture with Vale.*

22. At all material times, BHP's interest in Samarco:

- (a) represented a significant investment by BHP;
- (b) was a core asset of BHP;

Particulars

- i. In October 2005, BHP announced the approval of the Third Pellet Plant Project at the Germano Complex, which would increase Samarco's annual iron ore pellet production capacity by 7.6 million tonnes to 21.6 million tonnes per annum, at a cost of US\$590 million (BHP Billiton share): see BHP News Release "BHP Billiton Approves Samarco Expansion" dated 20 October 2005.*
- ii. In April 2011, BHP announced the approval of the US\$3.5 billion (BHP Billiton share US\$1.75 billion) Fourth Pellet Plant Project (**P4P Project**), which would increase Samarco's annual iron ore pellet production capacity by 8.3 million tonnes to 30.5 million tonnes: see BHP News Release "BHP Billiton Approves Samarco Expansion" dated 29 April 2011.*
- iii. In its FY2014 annual report, at page 18, BHP described its interest in Samarco as one of its 19 "core assets".*
- iv. In its annual reports, BHP stated, amongst other things, the following in respect of its interest in Samarco:*

Year	Iron Ore Measured Resources	Proved Iron Ore Reserves	BHP's Share of Production	Reserve Life	Carrying Value
FY2012	3,041Mt	1,094Mt	11.423Mt	31 years	US\$909m
FY2013	3,000Mt	1,900Mt	10.982Mt	40 years	US\$1,044m
FY2014	3,000Mt	1,800Mt	10.919Mt	39 years	US\$1,069m
FY2015	2,900Mt	1,400Mt	14.513Mt	38 years	US\$1,044m

- (c) generated a material component of BHP's total revenue and earnings.

Particulars

- i. *BHP's iron ore division represented the largest source of revenue for BHP in FY2013-FY2015 (BHP FY2015 annual report, page 35).*
- ii. *The Samarco mining operation was one of BHP's only two iron ore assets, the other being BHP's operations at Western Australian Iron Ore (BHP FY2015 annual report, page 42).*
- iii. *As at 30 June 2015, the Samarco mining operation represented 52.1% of BHP's measured iron ore resources, 32% of BHP's indicated iron ore resources, 43.5% of BHP's proven iron ore resources and 42.5% of BHP's probable iron ore resources (BHP FY2015 annual report, page 112).*
- iv. *On 6 November 2015, Deutsche Bank stated that "the mine represents c. 10% of our BHP's earnings" (Deutsche Bank market research report dated 6 November 2015, page 1).*
- v. *BHP's interest in Samarco contributed the following amounts in respect of the following years:*

	Revenue	Underlying EBIT to BHP	BHP's Total Underlying EBIT	% of BHP's Total Underlying EBIT
FY2012	US\$1,996m	US\$1,051m	US\$27,238m	3.86%
FY2013	US\$1,622m	US\$750m	US\$21,127m	3.55%
FY2014	US\$1,634m	US\$790m	US\$22,098m	3.575%
FY2015	US\$1,406m	US\$577m	US\$11,866m	4.86%

23. At all material times, Samarco owned and operated:

- (a) the Germano complex in the state of Minas Gerais, Brazil, comprising:
 - (i) an iron ore mine;
 - (ii) several concentrators; and
 - (iii) the Fundão tailings dam (the **Fundão Dam**),
 (the **Germano Complex**); and

- (b) several pellet plants and a port in the state of Espirito Santo, Brazil, connected by pipelines to the Germano Complex,

(collectively, the **Samarco mining operation**).

Particulars

The Samarco mining operation principally produced iron ore pellets, which involved extraction and beneficiation of iron ore at the Germano Complex and subsequent pellet production at the pellet plants in Espirito Santo.

- 24. During the Relevant Period, Samarco generated most of its revenue from the sale of iron ore extracted and beneficiated at the Germano Complex.

Particulars

Samarco's Financial Statements dated 31 December 2015, page 68.

- 25. At all material times, Samarco had a board of directors which:
 - (aa) as at 31 December 2013, consisted of 7 members, comprising 4 serving members and 3 alternate members;
 - (ab) as at 31 December 2014, consisted of 6 members, comprising 2 serving members and 4 alternate members;
 - (a) otherwise consisted of 8 members, comprising 4 serving members and 4 alternate members;
 - (b) was comprised of representatives appointed by Vale and BHP Brasil respectively;
 - (c) at most times, was comprised of equal numbers of representatives appointed by Vale and BHP Brasil respectively;
 - (d) had responsibility for setting company strategy, monitoring company performance, and directing and managing Samarco's management;
 - (e) had duties including establishing strategic guidance, approving business plans, investments and budget, and monitoring company performance.

Particulars

- i. Samarco's Financial Statement December 31, 2009 and 2008 authorised by Samarco's Executive Board on 26 April 2010, page 21.*

- ii. *Samarco's Management and Financial Statements December 31, 2010 authorised by Samarco's Executive Board on 10 February 2011, page 26.*
- iii. *Samarco's Management Report and Financial Statements December 31, 2012 authorised by Samarco's Executive Board on 25 March 2013, pages 14-16.*
- iv. *Samarco's Management Report and Financial Statements December 31, 2013 approved by Samarco's Executive Board on 24 February 2014, pages 10-11.*
- v. *Samarco Management Report and Financial Statements December 31, 2014 approved by Samarco's Executive Board on 16 March 2015, page 7.*

26. Samarco's board of directors included the following persons:

- (a) Randolph, as a serving member of the board at all material times until about April 2013, including as Chairman in 2010 and 2012;
- (b) Ashby, as a serving member of the board at all material times until about December 2012;
- (c) Wilson, as a serving member of the board at all material times from about December 2012, including as Chairman of the board during 2014 and Vice (or Deputy) Chairman of the board during the latter half of 2013 and during 2015;
- (d) Zweig, as an alternate member of the board from about April 2012 until 2013 and as a serving member of the board from about 2013 until about late 2014;
- (e) Beck, as an alternate member of the board from about September 2014;
- (f) Fernandes, as an alternate member of the board from about December 2012;
- (g) Ottaviano, as a serving member of the board from about August 2015;
- (h) Campbell, as an alternate member between about December 2010 and April 2012;
- (i) Mr John Dunbar Slaven (**Slaven**), as an alternate member of the board from at least about December 2009 to about September 2010; and
- (j) Mr Rogerio Nogueira (**Nogueira**), as an alternate member of the board from at least about December 2009 to about April 2012.

Particulars

- i. *Samarco's Financial Statement December 31, 2009 and 2008 authorised by Samarco's Executive Board on 26 April 2010, page 113.*
 - ii. *Samarco's Management and Financial Statements December 31, 2010 authorised by Samarco's Executive Board on 10 February 2011, page 135.*
 - iii. *Samarco's Management Report and Financial Statements December 31, 2012 authorised by Samarco's Executive Board on 25 March 2013, page 120.*
 - iv. *Samarco's Management Report and Financial Statements December 31, 2013 approved by Samarco's Executive Board on 24 February 2014, pages 118.*
 - v. *Samarco's Management Report and Financial Statements December 31, 2014 approved by Samarco's Executive Board on 16 March 2015, page 92;*
 - vi. *Slaven was, from around 2010 to 2013, Vice President of Business Development for BHP, and from around 2013 to the end of the Relevant Period, Vice President of Strategy Developments for BHP.*
 - vii. *Nogueira was an Executive in the Iron Ore Business from around April 2008 to around the end of 2011 or the start of 2012.*
27. At all material times from at least 2009, Samarco's board of directors was advised by and/or had various committees.

Particulars

- i. *At all material times from at least 2009, the board was advised by a finance and strategy committee (**F&S Committee**), an operations committee (**Operations Committee**) and a remuneration committee (**Remuneration Committee**).*
- ii. *[Deleted.]*
- iii. *At all material times, from at least 2013 until 2014, the board was advised by a committee in relation to the Fourth Pellet Plant Project (**P4P Steering Committee**).*
- iv. *At all material times, from 2014, the board was advised by an audit committee (**Audit Committee**).*
- v. *[Deleted.]*
- vi. *The F&S Committee had three subcommittees: a treasury subcommittee, a taxes and contingencies subcommittee, and an audit subcommittee (**Risks Subcommittee**).*
- vii. *The Operations Committee had three subcommittees: a performance management subcommittee (also referred to as an operational performance subcommittee) (**Performance Management Subcommittee**); a capital projects subcommittee (**Capital Projects Subcommittee**); and a technical subcommittee.*

28. The role of:

- (a) the F&S Committee included *inter alia* to advise on strategic, economic and financial matters;
- (b) the Operations Committee was to advise on matters relating to operations and technical issues at Samarco;
- (c) [Deleted.]
- (d) the P4P Steering Committee was to advise on matters relating to the P4P Project;
- (e) [Deleted.]

28A. At all material times, the Samarco executive board:

- (a) was the most senior executive body of Samarco;
- (aa) was comprised of persons appointed by the Samarco board of directors;
- (b) reported to the Samarco board of directors;
- (c) had its performance monitored by the Samarco board of directors.

28B. At all material times, Samarco's management of its tailings storage facility was undertaken by the Samarco executive board and committees and/or departments reporting directly or indirectly to the Samarco executive board including:

- (a) the Samarco Dams Committee (**CBS**), a committee of the Samarco executive board;
- (b) the General Management of Geotechnics (**GGGT**);
- (c) the Geotechnics Dam Management (**GGB**).

28C. At all material times from at least 2011, the Independent Tailings Review Board (**ITRB**):

- (a) was a board of independent experts constituted by Samarco to advise on technical matters relating *inter alia* to tailings disposal and the development and operation of the Fundão Dam;

- (b) attended the Germano Complex two to three times per year, following which it produced reports and held meetings (referred to as 'closure meetings') in which its findings and recommendations were presented;
- (c) was a critical control for BHP of the risk of failure of Samarco's tailings storage facilities including the Fundão Dam.

Particulars

As to subparagraph (c), the Joint Applicants refer to:

- A. BHP presentation titled 'Risk Snapshot Samarco Operations' dated November 2012, page 9;*
- B. email from Corless to Ferreira, Fernandes and Cardoso dated 6 October 2013 (BHP00060677) stating "the reality is that the ITRB is probably the most significant control from BHPB perspective as it [sic] we have an independent panel of experts check all of the items that you and we have articulated and see how they are being maintained over time".*

- 29. At all material times from at least July 2011, BHP was represented on the Operations Committee by Guilherme Campos Ferreira (**Ferreira**).
- 30. Further, at all material times, BHP was represented:
 - (a) on the Operations Committee by Evilmar Jose da Fonseca (**da Fonseca**), Manager of Iron Ore Operations, and by Nogueira until about December 2013, and by Fernandes and Ferreira from about December 2013;
 - (b) on the F&S Committee by Nogueira until about December 2013, and by Fernandes and Andre Cardoso (**Cardoso**), BHP Iron Ore, from about December 2013;
 - (c) on the P4P Steering Committee by Nogueira until about 2013, by Fernandes from about 2013, and by Ferreira from about 2012 (until the committee was disbanded in 2014);
 - (d) on the Remuneration Committee by Randolph until about 2013 and by Wilson from about 2013;
 - (e) on the Audit Committee by Peter Lynch (**Lynch**), BHP Senior Manager of Audit for South America, and Cardoso from about 2013;

- (f) on the Performance Management Subcommittee by da Fonseca until about 2013, by Fernandes from about 2013, by Ferreira from about 2012, and by Cardoso from about 2014;
- (g) on the Capital Projects Subcommittee by Ferreira until the end of the Relevant Period, by da Fonseca until about 2013, by Fernandes from about 2013, and by Cardoso from about 2014;
- (h) on the Risks Subcommittee by Fernandes, Lynch, Cardoso and Corless from about 2014, and by Natie Victor, Iron Ore Risk Manager at BHP, from about 2015;
- (i) at meetings of the Samarco Programa de Projetos Estruturantes (Structural Projects Program) (**PPE**) by Ferreira, Fernandes and Thais Jacques (**Jacques**), Engineer, Iron Ore at BHP;
- (j) at closure meetings of the ITRB.

Particulars

As to subparagraph (j), as best the Joint Applicants can say prior to further discovery:

- i. Ferreira attended (at least) ITRB closure meetings on 26 April 2013, 11 December 2013, ~~and 28 February 2014~~, 25 July 2014, 14 November 2014, and 26 June 2015.*
- ii. The Joint Applicants refer further to the minutes of the Performance Management Subcommittee on 30 September 2013.*
- iii. It is inferred that BHP representatives attended the other ITRB closure meetings from the letter from Angela Kupper, member of the ITRB during the Relevant Period, to Brazilian authorities dated 14 September 2016 which states that ITRB closure meetings were attended by representatives of BHP.*

~~*Further particulars may be provided following further discovery.*~~

- 30A. At all material times, persons employed by BHP (and its subsidiaries including BHP Brasil) in the Iron Ore Business reported directly or indirectly to one or more of the persons referred to in paragraphs 11 to 17 above including Randolph, Ashby and/or Wilson.

FA. BHP RISK AND AUDIT FUNCTIONS

FA.1 Audit functions

30B. At all material times until around 2010, BHP had (at least) the following internal audit functions:

- (a) internal audits carried out by BHP's Group Audit Services, which sat within the Group Risk Assessment and Assurance (**RAA**) function;
- (b) assurance reviews conducted by BHP's Health, Safety, Environment and Community (**HSEC**) function.

30C. From around 2010, the HSEC's assurance role was integrated into the RAA.

Particulars

*The Joint Applicants refer to the first witness statement of Peter Heneghan Lynch dated 21 April 2024 (**Lynch Statement**) served by the BHP defendants in the proceeding no. HT-2022-000304 in the High Court of Justice of England & Wales (**UK Proceeding**) at [12]-[16].*

30D. At all material times, one or more of BHP's internal audit functions included within its scope the review of processes to manage the integrity of critical infrastructure.

Particulars

This area was variously referred to as "Protection of Operating Facilities" and "Asset Integrity" (Lynch Statement at [14]-[18]).

30E. At all material times, BHP's audit functions:

- (a) reported to one or more committees of the BHP Board;

Particulars

*The RAA reported to the Group Risk and Audit Committee of the BHP Board and HSEC reported to the Sustainability Committee of the BHP Board (Lynch Statement [13], [15]; the first witness statement of Peter David Beaven dated 22 April 2024 (**Beaven Statement**) served by the BHP Defendants in the UK Proceeding at [24]).*

- (b) ~~reported~~ provided regular reports and other information about risks and audits to the BHP GMC.

Particulars

Beaven Statement at [24], [30], [41], [47], [50].

FA.2 Risk functions

30F. At all material times, BHP had (at least) the following internal risk functions:

- (a) monitoring and reporting on risks and risk processes at the group level by the RAA; and
- (b) monitoring and reporting on risks and risk processes at the business unit level by business unit risk and audit committees (including, in the Iron Ore Business, the **Iron Ore RAC**).

Particulars

Beaven Statement at [17]-[21].

30G. At all material times, BHP's internal risk functions:

- (a) reported to one or more committees of the BHP Board;

Particulars

The RAA and business-level risk and audit committees (including the Iron Ore RAC), reported to the Group Risk and Audit Committee of the BHP Board (Beaven Statement at [20]-[21]).

- (b) reported to the BHP GMC.

Particulars

Beaven Statement at [20].

FB. PANEL REPORT

30H. On 5 November 2015 (Brazilian time), the Fundão Dam failed leading to a catastrophic release of tailings.

30I. Following the failure of the Fundão Dam, BHP, Vale and Samarco caused to be constituted a panel of geotechnical experts to conduct an investigation to determine the immediate causes of the failure.

Particulars

*The panel was comprised of Norbert R. Morgenstern, Steven G. Vick, Bryan D. Watts and Cassio B. Viotti (**Panel**).*

- 30J. On 25 August 2016, the Panel delivered a report containing its factual findings and conclusions regarding the immediate causes of the failure of the Fundão Dam.

Particulars

Report of the Panel entitled 'Report on the Immediate Causes of the Failure of the Fundão Dam' (Panel Report).

The conclusions and findings contained in the Panel Report included:

- i. "[t]he Fundão Tailings Dam failed on November 5, 2015 in a liquefaction flowslide that initiated at the dam's left abutment" (page i);*
- ii. "... the failure of the Fundão Tailings Dam by liquefaction flowsliding was the consequence of a chain of events and conditions. A change in design brought about an increase in saturation which introduced the potential for liquefaction. As a result of various developments, soft slimes encroached into unintended areas on the left abutment of the dam and the embankment alignment was set back from its originally-planned location. As a result of this setback, slimes existed beneath the embankment and were subjected to the loading its raising imposed. This initiated a mechanism of extrusion of the slimes and pulling apart of the sands as the embankment height increased. With only a small additional increment of loading produced by the earthquakes, the triggering of liquefaction was accelerated and the flowslide initiated" (page iii);*
- iii. the further matters in the Panel Report referred to in the particulars in Section G below.*

- 30K. The conclusions reached by the Panel as to the immediate causes of the failure of the Fundão Dam, and the underlying factual findings made by the Panel, contained in the Panel Report:

(a) are true and correct;

(b) included the following conclusions and/or findings, which are true and correct:

- (i) the Fundão Dam failed on 5 November 2015 (Brazilian time) in a liquefaction flowslide that initiated at the dam's left abutment;
- (ii) the failure of the Fundão Dam by liquefaction flowsliding was the consequence of a chain of events and conditions:
 - a. there was an increase in saturation which introduced the potential for liquefaction;
 - b. soft slimes encroached into unintended areas at the left abutment of the dam;

- c. the embankment alignment was set back from its originally-planned location at the dam's left abutment and, as a result of this setback, slimes existed beneath the embankment;
 - d. the slimes underlying the setback embankment were subjected to the loading as the Fundão Dam was raised;
 - e. loading on the underlying slimes resulted in deformation, and liquefaction was triggered and a flowslide was initiated, resulting in the failure of the Fundão Dam;
- (iii) each of the further matters in the Panel Report set out or referred to in the particulars to the allegations pleaded in Section G below.

G. THE FUNDÃO DAM

G.1 Design, location and construction of the Fundão Dam

31. In October 2005, BHP announced the approval of the Third Pellet Plant Project at the Germano Complex, which would increase Samarco's annual iron ore pellet production capacity by 7.6 million tonnes to 21.6 million tonnes per annum, at a cost of US\$590 million (BHP Billiton share).

Particulars

BHP News Release "BHP Billiton Approves Samarco Expansion" dated 20 October 2005.

32. The Third Pellet Plant Project:
- (a) would lead to an increase in tailings waste at the Germano Complex as a result of the growth in production; and
 - (b) involved *inter alia* the construction of the Fundão Dam to store the increased tailings waste.

Particulars

Panel Report, page 5.

33. By no later than 2008, Samarco approved a design for the Fundão Dam (**Original Design**).

Particulars

The Original Design is discussed in the Panel Report at section 2.1.

34. The Original Design was created by Joaquim Pimenta de Avila of Pimenta de Avila Consultoria Ltda (**Pimenta**).
35. At all material times, the site of the Fundão Dam was:
 - (a) within 10 kilometres upstream from the village of Bento Rodrigues;
 - (b) in the proximity of the Gualaxo do Norte river in the Municipality of Mariana, which flows into or merges downstream with the river Carmo and the river Doce;
 - (c) one of the highest sites for a tailings dam in Brazil;
 - (d) adjacent to the Grota da Vale and the Fabrica Nova waste pile operated by Vale.

Particulars

- i. *As to subparagraph (c), the Joint Applicants refer to the ITRB report dated October 2011 (ITRB Report No. 3), page 5.*
 - ii. *As to subparagraph (d), Vale operated the Fabrica Nova mining complex near the Germano Complex, which included a waste pile located upstream from the left abutment of the Fundão Dam. From around November 2010, water accumulated behind a dike located downstream from the Fabrica Nova waste pile and above the left abutment of Fundão Dam in an area referred to as the Grota da Vale (Panel Report at page 13, B.B1-11).*
36. The Fundão Dam was constructed using the upstream method, which involved *inter alia*:
 - (a) the construction of a starter dam;
 - (b) the progressive raising of the dam crest upstream over previously deposited tailings.

Particulars

Panel Report, page 4.

37. Tailings dams constructed using the upstream method generally:
- (aa) require less material to construct;
 - (ab) are less expensive to construct;
 - (a) are less structurally secure;
 - (b) are more susceptible to liquefaction;
 - (c) are more prone to ~~accidents due to structural~~ global and localized failures if the internal water level is not well controlled; and
 - (d) require greater monitoring and control of internal water levels and drainage,
- than tailings dams constructed using the downstream method or centreline method.

Particulars

*The Joint Applicants refer to the expert report of Daniel D. Overton filed on 21 February 2025 (**Overton Report**), Section 2.3.*

38. On or around 2 December 2008, tailings from the operation of the Germano Complex commenced to be deposited in the Fundão Dam.
- 38A. Following the commencement of use of the Fundão Dam:
- (a) in April 2011, BHP announced the approval of the US\$3.5 billion (BHP Billiton share US\$1.75 billion) P4P Project, which:
 - (i) would increase Samarco's annual iron ore pellet production capacity by 8.3 million tonnes to 30.5 million tonnes;
 - (ii) would lead to an increase in tailings waste at the Germano Complex as a result of the increase in production;
 - (iii) did not involve the construction of a new tailings storage facility to accommodate the increase in tailings;

Particulars

BHP News Release "BHP Billiton Approves Samarco Expansion" dated 29 April 2011.

- (b) in the March quarter of 2014, the fourth pellet plant commenced producing iron ore pellets, following which total production of iron ore pellets by Samarco, and associated tailings waste, increased significantly.

Particulars

- i. *Samarco's fourth pellet plant delivered its first iron ore pellet production in the March quarter of 2014 (BHP FY2014 annual report, page 17).*
- ii. *Samarco iron ore pellet production increased by 29% in the second half of 2014 to a record 14 Mt as the ramp-up of the fourth pellet plant continued (BHP Operational Review for half year ended 31 December 2014, page 8).*
- iii. *Samarco production for the nine months ended March 2015 increased by 37% to a record 22 Mt as the fourth pellet plant reached full capacity during the period (BHP Operational Review for the nine months ended 31 March 2015, page 7).*
- iv. *Samarco production increased by 33% in FY2015 to 29 Mt as the fourth pellet plant ramped up to full capacity during the March quarter of 2015 (BHP Operational Review year ended 30 June 2015, page 7).*
- v. *In the September quarter of 2015, iron ore pellet production by Samarco increased 9% to 7.5 million tonnes (BHP Operational Review for the quarter ended 30 September 2015, page 6).*

G.1A Design and safety requirements and storage capacity

38B. The Original Design included that:

- (a) the Fundão Dam was to be constructed using the upstream method, which involved *inter alia*:
 - (i) the construction of a starter dam;
 - (ii) the progressive raising of the dam crest upstream over previously deposited tailings;
- (b) the crest of the starter dam was to be raised to an elevation of 830 metres, and the Fundão Dam was to be raised to a final elevation of 920 metres;
- (c) there was to be initial physical separation of:
 - (i) sands, to be deposited in the reservoir behind the starter dam (**Dike 1**);
 - (ii) slimes, to be deposited in a smaller reservoir behind a second dike upstream from Dike 1 (**Dike 2**);

Particulars

*The Fundão Dam was designed to contain two types of tailings. Sand tailings (**sands**) refers to a mixture of coarser sand-sized particles and finer silt-size particles. Sands are relatively free-draining, but when loose and saturated are susceptible to liquefaction. Slimes tailings (**slimes**) refers to finer, clay-like particles that are relatively soft and compressible and have low permeability (Panel Report, pages i, 4).*

- (d) as the dam was raised, the sands in the reservoir behind Dike 1 were to form a drained structure to retain the slimes deposited upstream and were therefore required to be higher than the slimes;
- (e) an area of at least 200 meters upstream from the Fundão Dam crest was to be reserved for the deposit of sands, without any slimes being deposited in the area (**Minimum Beach Width**);
- (f) there was to be a high-capacity drainage system at the base of Dike 1 (**Base Drain**) to drain water from the tailings and control the saturation of the sands;
- (g) for drainage purposes, in particular to manage surface water inflows, there was to be a concrete gallery under the right abutment (**Main Gallery**) and a concrete gallery under the left abutment (**Secondary Gallery**).

Particulars

- i. *Panel Report, pages 4-5.*
- ii. *Operations Manuals dated 22 June 2007 (**2007 Operations Manual**), 13 June 2011 (**2011 Operations Manual**) and 6 July 2012 (**2012 Operations Manual**).*
- iii. *The Joint Applicants further refer to:*
 - A. *report of visit to Fundão Dam by Ferreira and Jacques dated 17 April 2009 containing minutes of meeting with Samarco regarding the 'Piping Incident' referred to in paragraph 40(a)(i) below;*
 - B. *report of an external consultant, Dr Andrew Robertson (**Dr Roberston**) dated 7 May 2009 (**May 2009 Robertson Report**), page 3;*
 - C. *BHP Presentation to the Samarco pre-board meeting dated 21 July 2009, slides 4-5;*
 - D. *ITRB report dated November 2011 (**ITRB Report No. 3 (Rev. 1)**), pages 3-4 and ITRB report dated May 2012 (**ITRB Report No. 4**), section 6;*
 - E. *presentation to the Samarco board of directors dated 4 December 2012, slides 11-12 and minutes of the meeting on 7 December 2012 at section 4.1.2b.*

~~Further particulars may be provided following further discovery and the filing of~~

~~expert reports.~~

39. At all material times from the commencement of use of the Fundão Dam, it was important for the structural integrity and safe operation of the dam that:

- (a) there be adequate drainage of the tailings deposited in the dam, and in particular the sand tailings;

Particulars

- i. *Panel Report, page 4.*
- ii. *2007, 2011 and 2012 Operations Manuals.*
- iii. *This matter is further inferred from the fact that the Fundão Dam was to be constructed using the upstream method and the matters referred to in paragraph 37 above.*

~~Further particulars may be provided following further discovery and the filing of expert reports.~~

- (b) the separation and proportion of sand tailings and slime tailings deposited in the dam be managed in accordance with the Original Design;

Particulars

*The Joint Applicants refer to paragraph 38B(c) and (d) above and the particulars subjoined thereto, and to the report of Dr Robertson dated 9 December 2008 (**December 2008 Robertson Report**), pages 5, 11.*

~~Further particulars may be provided following further discovery and the filing of expert reports.~~

- (c) the operations manual for the Fundão Dam be updated in circumstances where there were significant modifications in the design of the dam; in circumstances where there were changes in the geometry of the dam; in circumstances where there were changes in the quantity of tailings deposited into the dam; and in any event every two years;

Particulars

- i. *Transcript of testimony of Joaquim Pimenta de Avila, page 66 042 Pimenta KT_243_550_Audio(1).wma.*
- ii. *2007, 2011 and 2012 Operations Manuals.*

~~Further particulars may be provided following further discovery and the filing of expert reports.~~

- (ca) there be adequate design, documentation and analysis of the raising of the Fundão Dam, and changes to the Original Design, throughout its lifecycle;

Particulars

This is to be inferred from the fact that the Fundão Dam was to be constructed using the upstream method and the matters referred to in paragraph 37 above.

~~*Further particulars may be provided following further discovery and the filing of expert reports.*~~

- (d) the Minimum Beach Width be maintained;

Particulars

i. 2007, 2011 and 2012 Operations Manuals.

ii. The Joint Applicants further refer to: the Pimenta report to Samarco dated March 2012 at page 24; the Pimenta report to Samarco dated May 2012, pages 4, 24; the ITRB report dated 20 November 2014 (ITRB Report No. 11), page 11;

~~*Further particulars may be provided following further discovery and the filing of expert reports.*~~

- (e) the Fundão Dam be adequately monitored for saturation, pore pressure, erosion, cracks and other indicators of possible structural problems or incipient failure.

Particulars

i. 2012 Operations Manual, pages 28-37.

ii. This is also to be inferred from the fact that the Fundão Dam was to be constructed using the upstream method and the matters referred to in paragraph 37 above.

~~*Further particulars may be provided following further discovery and the filing of expert reports.*~~

- (f) Samarco have adequately experienced and competent personnel and consultants to manage the design, construction and operation of the Fundão Dam;

Particulars

This is to be inferred from the fact that the Fundão Dam was to be constructed using the upstream method and the matters referred to in paragraph 37 above.

~~*Further particulars may be provided following further discovery and the filing of expert reports.*~~

- (g) Samarco have in place an adequate tailings management system for the Fundão Dam and that system be complied with;

Particulars

- i. *Elements of a tailings management system include: defined roles and assigned responsibilities for tailings management to suitably qualified personnel; processes and procedures for planning, resource allocation, risk management, emergency action planning and response, changes to design, quality control and quality assurance of construction; and a dam safety program. A tailings management system should cover different stages in the life of the dam, including construction, operation, expansion, closure, and post-closure: Overton Report at Section 2.4.3.1.*
- ii. *This is to be inferred from the fact that the Fundão Dam was to be constructed using the upstream method and the matters referred to in paragraph 37 above.*
- iii. *The Joint Applicants further refer to the BHP presentation titled 'Risk Snapshot Samarco Operations' dated November 2012.*

~~*Further particulars may be provided following further discovery and the filing of expert reports.*~~

39A. At all material times from at least 8 August 2012:

- (a) the Fundão Dam was the primary storage facility for sands and slimes produced at the Germano Complex;
- (b) Samarco's other tailings storage facilities at the Germano Complex were approaching or had reached their maximum capacity and/or were unavailable to receive substantial additional tailings;
- (c) the ability to dispose of tailings in the Fundão Dam was essential to the continuing operation of the Germano Complex.

Particulars

- i. *By 2005, when the Third Pellet Plant Project was announced, the existing tailings storage facilities at the Germano Complex were nearing capacity. The Fundão Dam was designed as a new tailings facility to receive future tailings (Panel Report, page 5; 2012 Operations Manual, page 5-6).*
- ii. *The Joint Applicants refer to:*
 - A. *the BHP presentation to the Samarco pre-board meeting on 7 August 2012, which records that the current available areas for tailings disposal at the Germano Complex were the Fundão Dam; the Germano dam, which had nearly reached its capacity; and the Germano old pit, the use of which was to be avoided because it sat above "good quality ore" and any deposited tailings would need to be later removed;*
 - B. *the BHP presentation to the Samarco pre-board meeting on 18 September 2014, which records that the current available areas for tailings disposal at the Germano Complex remained the same as recorded in the presentation to the Samarco pre-board meeting on 7*

August 2012.

- iii. *Prior to the collapse of the Fundão Dam on 5 November 2015 (Brazilian time), several alternatives for the storage of tailings produced by operations at the Germano Complex were considered by Samarco and BHP. However, other than the planned elevation of the Fundão and Germano dams to a final elevation of 940 meters (referred to at paragraph 42(da) below), no other project for the construction of substantial additional tailings storage had reached execution phase before that time (report of the Samarco board of directors meeting dated 5 August 2015, pages 30-31).*
- vi. *The Joint Applicants further refer to the BHP presentation to the Samarco pre-board Meeting on 9 August 2011 titled 'Samarco – Dam Safety'.*

~~*Further particulars may be provided following further discovery and the filing of expert reports.*~~

- 39B. The matters in paragraphs 38B to 39A (cumulatively, to the extent proven) are referred to herein as the '**Safety and Capacity Information**'.

G.2 Problems as at 8 August 2012

40. By no later than 8 August 2012, it was the case that:

- (a) the Fundão Dam had experienced numerous structural and drainage problems, including:
 - (i) in April 2009, a serious incident occurred when large seepage flows indicative of internal erosion and piping appeared on the downstream slope of Dike 1 caused by a failure of the Base Drain (the **Piping Incident**);
 - (ii) between around July 2010 and July 2012, damage and structural defects were identified in the Main and Secondary Galleries (the **Gallery Incidents**);

Particulars

- i. *The structural problems experienced from around April 2009 to around August 2012 included the following:*
 - A. *In or around December 2008, a crack appeared delimiting a slip area, located in the lower dam bank and to the right of the Base Drain. This developed into a rupture.*
 - B. *On or about 13 April 2009, large seepage flows carrying fines, or fine soil particles, appeared on the downstream slope of Dike 1 of the Fundão Dam, which were indicative of internal erosion or piping (Panel Report, pages 7-8).*

- C. *[Deleted.]*
- D. *In about July 2010, there was a vortex in the reservoir above the Main Gallery for the right abutment, which led to inspections of the relevant area that revealed cracking and structural damage from foundation settlement and construction defects (Panel Report, page 11).*
- E. *By February 2011, at the Main Gallery, there was breakdown of contraction joint sealing devices, infiltration through concrete joints and holes in the gallery, a large number of cracks, instability in the gallery base, rupture of joints, and misalignments on the concrete surfaces between gallery modules (Report prepared by Pimenta dated 25 February 2011, page 37).*
- F. *Similar conditions to those referred to in the preceding subparagraph were discovered in the Secondary Gallery prior to July 2012 (Panel Report, page 11).*
- ii. *As to the Piping Incident, the Joint Applicants further refer to:*
 - A. *report of a visit to the Fundão Dam by Ferreira and Jacques dated 17 April 2009;*
 - B. *May 2009 Robertson Report;*
 - C. *BHP presentation to the Samarco pre-board meeting dated 21 July 2009, slides 6-11;*
 - D. *report of the Samarco board of directors meeting on 2 December 2009, pages 117-120;*
- iii. *As to the Gallery Incidents, the Joint Applicants further refer to:*
 - A. *report of Dr Robertson dated 20 November 2010 (**20 November 2010 Robertson Report**), pages 5-7;*
 - B. *AMEC Earth & Environmental report to Samarco dated August 2010, pages 2-3;*
 - C. *ITRB Report dated April 2011 (**ITRB Report No. 1**), pages 5-6;*
 - D. *report of Dr Robertson dated 13 April 2011 (**April 2011 Robertson Report**);*
 - E. *ITRB Report dated July 2011 (**ITRB Report No. 2**), pages 6-7;*
 - F. *ITRB Report No. 3 (Rev. 1) at pages 11-13;*
 - G. *email from Gavin Wilby (BHP, Insurance Practitioner, Group RAA) to Annette McIlroy (BHP, Manager Risk, BHP Group RAA) (**McIlroy**) dated 12 May 2011 (BHP00121508) attaching minutes of meeting regarding an investigation of the incident at the Main Gallery in July 2010;*
 - H. *ITRB Report No. 4, pages 4-6;*
 - I. *ITRB Report dated October 2012 (**ITRB Report No. 5**), pages 2-3, 18-19;*
 - J. *ITRB Report dated April 2013 (**ITRB Report No. 6**), page 7.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

(aa) following the Piping and Gallery Incidents:

- (i) investigations revealed:
 - (A) operational deficiencies in the start-up of Dike 1 and construction flaws in the Base Drain, including that a portion of the drain's outlet had never been completed;
 - (B) construction defects in the Main and Secondary Galleries and problems with foundation settlement;
 - (C) deficiencies in Samarco's quality assurance (**QA**) and quality control (**QC**) processes and that 'as built' reports were not available;
- (ii) works were undertaken to remediate the Dike 1 starter dam, but Samarco was unable to return the Base Drain to service;
- (iii) remedial works were undertaken on the Main and Secondary Galleries but problems with the galleries were continuing;

Particulars

- i. Subsequent to the Piping Incident, engineering investigations revealed construction flaws in the Base Drain and filters of the Fundão Dam, including a portion of the drain's outlet that had never been completed (Panel Report, page 8).*
- ii. Between July 2010 and June 2011, the Main Gallery was taken out of service in order to perform remedial jet grouting works (Panel Report, pages 11; B B.B2-1). Between December 2011 and February 2012, similar jet grouting programs were undertaken for the Secondary Gallery (Panel Report, page B.B2-1). However, by July 2012 it had become apparent that these had not cured the problems (Panel Report, page 11).*
- iii. The Joint Applicants further refer to particulars (ii) and (iii) subjoined to subparagraph (a) above and:*
 - A. December 2008 Robertson Report, which identifies the potential for problems with the Base Drain and made recommendations to address them which were not followed by Samarco;*
 - B. email from Gary Bentel (BHP, Geotechnical Manager) (**Bentel**) to Rob Watson (BHP, Vice President of Business Development) (**Watson**) and Slaven dated 26 May 2009 (BHP00026258) at 0003-0004;*
 - C. report titled 'FY-14 Iron Ore-SAMARCO Internal Audit Report # 4410' dated September 2013 (**FY14 Technical Audit Report**), page 14;*
 - D. papers presented to the Iron Ore RAC meeting on 6 February 2014*

page 136.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (ab) there were chronic shortages of storage capacity for tailings, in particular slimes, due to the Dike 2 reservoir being filled ahead of schedule, and delays in the filling of the Dike 1 reservoir with sands while works were undertaken following the Piping and Gallery Incidents;

Particulars

- i. *By no later than 2011, the balance between sands and slimes crucial to the dam raising plan had changed. The filling of the Dike 2 reservoir had begun earlier than anticipated, making the slimes level higher, rather than lower, than sands in the Dike 1 reservoir. The Piping Incident and Gallery Incidents delayed the raising of the sands in front of Dike 2. Reduction in pellet production also reduced the amount of sands available while the delivery of slimes continued. This created the need for additional slimes capacity (Panel Report, pages 8, 39-40).*
- ii. *The Joint Applicants further refer to:*
 - A. *December 2008 Robertson Report, page 5;*
 - B. *report of the Samarco board of directors meeting on 2 December 2009, page 117;*
 - C. *April 2011 Robertson Report, pages 3, 17;*
 - D. *ITRB Report No. 2, page 1;*
 - E. *ITRB Report No. 3 (Rev. 1), pages 9-10;*
 - F. *ITRB Report No. 4, pages 1-3;*
 - G. *BHP presentation titled 'Risk Snapshot Samarco Operations' dated November 2012.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (b) significant changes from the Original Design had been made to the Fundão Dam, including:
- (i) in late 2009, the Base Drain was sealed, rendering inoperative the primary structure for drainage of the tailings in the Original Design;
 - (ii) the internal drainage was redesigned to incorporate, as the primary structure for drainage of the tailings, a blanket drain (**826m Blanket Drain**) constructed on top of the tailings already deposited behind Dike 1, which tailings would remain saturated together with much of the tailings behind it;

- (iii) to provide additional slimes capacity while repair works were undertaken following the Piping Incident, a third dike (**Dike 1A**) was constructed about 150 meters upstream from Dike 1, between Dikes 1 and 2, and behind which slimes were deposited;
- (iv) due to the ongoing shortage of slimes storage capacity, an overflow channel was constructed and allowed slimes to flow directly between the reservoir behind Dike 2 and the reservoir behind Dike 1 (**Overflow Channel**);

Particulars

- i. *The Original Design had involved the Base Drain (Panel Report, page 6). As a result of investigations following the Piping Incident, the Base Drain was sealed and rendered inoperative (Panel Report, page 8). This occurred in or around October 2009 (Panel Report, page 8).*
- ii. *Between June 2010 and November 2010, the design of the dam was further revised to include a blanket drain at El. 826m on the surface of the tailings (Panel Report, page B.B1-20). The 826m Blanket Drain was located near the top of sand tailings that had nearly filled the starter dam at that time (Panel Report, page 28).*
- iii. *The use of the 826m Blanket Drain, rather than the Base Drain as originally planned, had the effect that sand tailings below the drain, as well as much of the sand tailings behind it, were left saturated (Panel Report, page 10).*
- iv. *The Original Design involved sand tailings and slimes tailings initially being separated, with sands deposited behind Dike 1 and slimes behind Dike 2. The Original Design contemplated that, over time, the crest of the dam would rise such that sand deposits would eventually form a structure to contain slimes. This required that the sands deposited between the two dikes always remained at a higher elevation than the slimes throughout the raising process (Panel Report, page 5).*
- v. *The Original Design involved the use of the Main Gallery beneath the right abutment and the Secondary Gallery beneath the left abutment of the dam, for drainage purposes, and in particular, to evacuate surface water inflows from ordinary precipitation, floods, and discharged tailings slurry (Panel Report, page 6).*
- vi. *Due to the above problems with drainage in the Main and Secondary Galleries, it became necessary to re-route water and slimes from the Dike 2 reservoir into the Dike 1 reservoir. An overflow channel was constructed from the Dike 2 slimes reservoir into the Dike 1 reservoir in the period from around September 2010 to the end of January 2011. The Overflow Channel was operative from around February 2011 until it was closed (for a period) in August 2012 (Panel Report, pages 39-40; B.B2-1).*
- vii. *The ongoing problems with the Main and Secondary Galleries also meant work commenced on the construction of an auxiliary spillway as a replacement decant for the Dike 1 and 2 reservoirs (Panel Report, pages 11*

and B.B1-34).

viii. *The Joint Applicants further refer to the matters in paragraph 38B above and:*

- A. *as to subparagraphs (i) and (ii), report of the Samarco board of directors meeting on 2 December 2009, pages 119-120; report of the Samarco board of directors meeting on 12 May 2010, pages 95-96; 2012 Operations Manual; that the tailings under and behind the 826m Blanket Drain would remain saturated is to be inferred from the fact that the Base Drain had been sealed and the 826m Blanket Drain was constructed on top of the existing tailings at an elevation of around 826m near the crest of the starter dam for Dike 1;*
- B. *as to subparagraph (iii), report of the Samarco board of directors meeting on 2 December 2009, page 119; 20 November 2010 Robertson Report, page 4, 8-9; Pimenta report to Samarco dated June 2011, page 3; 2011 Operations Manual, pages 20-21;*
- C. *as to subparagraph (iv), AMEC Earth & Environmental report dated August 2010, page 4; 20 November 2010 Robertson Report, pages 8-9; April 2011 Robertson Report, page 12, 27; 2011 Operations Manual, pages 20-21; ITRB Report No. 1, page 3; ITRB Report, No. 2, page 4; 2012 Operations Manual, page 22.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

(c) [Deleted.]

(d) despite ongoing structural problems, the size of the Fundão Dam increased considerably due to the ongoing deposition of tailings, including by reason of tailings from adjoining Vale operations being deposited in the Fundão Dam;

Particulars

- i. *Panel Report, pages 28-34.*
- ii. *From 2008 onwards, mud from adjoining operations of Vale had been deposited in the Fundão Dam and from 2011 onwards Fundão was the only dam in the Samarco Tailings System into which mud from Vale's operations was deposited (Federal Criminal Forensics Report - Report No 994/2016 (994 Report), pages 184 and 185).*
- iii. *From 2010, the volumes of mud from Vale's operations deposited into the Fundão Dam increased considerably from the depositions in previous years (994 Report, page 185).*
- iv. *The Joint Applicants further refer to:*
 - A. *December 2008 Robertson Report, page 5.*
 - B. *email chain between Matthew Gillespie (Financial Controller, BHP Iron Ore), writing on behalf of Randolph, to Nogueira and da Fonseca between 23 and 29 March 2012 with the subject 'Vale use of Samarco Tailings Dam' (BHP-000222914), and attached BHP powerpoint presentation titled "Contract for the Disposal of Vale slime in Samarco's tailings dam" which referred to Vale depositing 1.3Mtpa in 2011 equal*

to 7.5% of Samarco's annual tailings disposal rate in 2011;

- C. Samarco presentation titled, 'BHP Billiton visit – Samarco risk management – risk of rupture of dams' dated 16 May 2012, slide 5, noting the elevation of the Fundão Dam had increased to 849m and 7 million cubic meters of tailings had been deposited since the commencement of its use;
- D. presentation to the Samarco Performance Management Subcommittee dated November 2012, slide 92 and email from Germano Silva Lopes (Samarco, General Manager of Geotechnics) to Ben Arnold (BHP, Principal Risk Advisor, Risk & Governance) (**Arnold**), Corless and Fernandes titled 'BHP President Presentation' dated 22 October 2012, which noted the elevation of the Fundão Dam had increased to 855m and 13.23 million cubic meters of tailings had been deposited.
- v. Further, the increase in the size of the dam is to be inferred from the continuing production of iron ore pellets by Samarco and the reliance on the Fundão Dam for tailings storage at the Germano Complex as set out in paragraph 39A above.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (da) by at least May 2012, the crest of the Fundão Dam had been raised to an elevation of 849 meters;

Particulars

Samarco presentation titled, 'BHP Billiton visit – Samarco risk management – risk of rupture of dams' dated 16 May 2012.

- (e) [Deleted.]
- (ea) slimes had been deposited between Dikes 1 and 2 in areas over which the sand tailings were to be raised;

Particulars

- i. The crest of Dike 1A (containing slimes) was located approximately 120 metres from the crest of Dike 1, which increased the risk of mixing of slimes and sands (994 Report, pages 66, 69 and 82).
- ii. The Overflow Channel introduced slimes into the Dike 1 reservoir, disturbing the separation of sands and slimes which had been important to the Original Design (Panel Report, page 39-40).
- iii. The Joint Applicants further refer to paragraph 40(b)(iii) and (iv) above and particulars (viii)(b) and (c) subjoined thereto, and:
 - A. the 20 November 2010 Robertson Report, which identified as a "substantial concern" that slimes discharged upstream from Dike 1A and through the Overflow Channel "will underlie the sand tailings 'beach' as it is advanced upstream. These slimes will have high pore pressures and low shear strength. The resulting geometry may not yield adequate

factors of safety against instability” (page 8);

- B. *the April 2011 Robertson Report, which warned in relation to slimes deposited in the Dike 1 reservoir through the Overflow Channel, “[i]t is apparent that with the rate of slimes deposition and the low permeability of the slimes that any settled slimes maintain high pore pressures and very low shear strength resulting in sustained liquefaction and failure likely to result in an essentially flat pond bottom” (page 12);*
- C. *report of Pimenta dated September 2011, which warned that the original Dike 1 alignment, at its ultimate planned elevation of 920 meters, would not meet global stability due to the presence of slimes deposited behind Dike 1A (page 4);*

~~Further particulars may be provided following further discovery and the filing of expert reports.~~

- (f) there had been breaches of the Minimum Beach Width requirement;

Particulars

- i. *From at least May 2010 onwards, there had been such repeated breaches. During much of 2011 and the first half of 2012, the Minimum Beach Width had not been achieved more often than not, at times encroaching as little as 60 metres from the dam crest (Panel Report, pages 10, B-20-B-25; 994 Report, pages 263 and 266).*
- ii. *This is also to be inferred from the location of Dike 1A within 150 meters of Dike 1, behind which slimes were deposited, and 20 November 2010 Robertson Report, which refers to that fact that during the operation of the Overflow Channel “resulting FD-1 dam section will comprise a 120 m wide sand tailings outer zone with a slimes inner zone” (page 8).*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (g) the internal drainage of the Fundão Dam was not operating in accordance with the Original Design and/or there was saturation of sand tailings to an extent that was not anticipated in the Original Design;

Particulars

- i. *Panel Report, section 4.3.*
- ii. *The use of the 826m Blanket Drain, rather than the Base Drain as originally planned, had the effect that sand tailings below the drain, as well as much of the sand tailings behind it, were left saturated (Panel Report, page 10). The 826m Blanket Drain was called upon to carry nearly all of the seepage as the dam grew higher and the impoundment of the dam larger with time. The 826m Blanket Drain became increasingly unable to do so (Panel Report at page 28).*
- iii. *As at around July 2011, the 826m Blanket Drain spanned the entire width of the Dike 1 starter dam embankment, and the impoundment size of the dam was limited, with the 826m Blanket Drain beneath the discharged tailings*

within the impoundment, where the drain could intercept discharged tailings to the maximum effect (Panel Report, page 29).

- iv. After July 2011, the Dike 1 starter dam embankment and impoundment had widened and the dam had grown higher, extending beyond the limits of the 826m Blanket Drain. This had the effect of funnelling seepage flow into the narrower drain, and in the process raising the saturation levels in the tailings. At the same time, the impoundment was moving upstream and becoming more distant from the drain as upstream dam raising progressed, also increasing the volume of saturated tailings (Panel Report, section 4.3).*
- v. A high level of water was allowed to accumulate in the reservoir behind Dike 1A, which in turn caused the tailings downstream of that dam to remain saturated (994 Report, pages 66, 69 and 82).*
- vi. As to the operation of the drainage, the Joint Applicants further refer to the changes to the Original Design set out in paragraphs 40(b)(i)-(ii) above and the particulars subjoined thereto.*
- vii. As to the saturation of the tailings, the Joint Applicants further refer to paragraph 40(b)(ii) above, and particular (viii)(A) subjoined thereto.*

~~*Further particulars may be provided after further discovery and the filing of expert reports.*~~

- (ga) independent experts had issued warnings regarding the Fundão Dam and Samarco's management of its tailings storage facilities, including:
 - (i) in December 2008, that Samarco tailings dams had repeatedly reached unreasonably high risks of failure;
 - (ii) in November 2010, an independent expert who had advised Samarco since 1997 warned that its tailings dams had the highest risk profile of any comparable mining site of which the expert was aware and well beyond industry norms;
 - (iii) repeatedly between December 2008 and May 2012, that Samarco geotechnical staff lacked experience in the design, construction and operation of large tailings dams such as the Fundão Dam;
 - ~~(vi)~~(iv) in November 2011, that the shortage of storage capacity for slimes was driving Samarco to implement ever more risky tailings storage solutions;
 - (v) in November 2011 and May 2012, that the Main Gallery was predicted to fail once tailings loaded above it reached an elevation of 860m, which

was expected to occur by December 2012, and there was no basis for damage control should either of the Main or Secondary Galleries fail;

Particulars

The Joint Applicants refer to:

- i. as to subparagraph (i), December 2008 Robertson Report, page 4;*
- ii. as to subparagraph (ii), 20 November 2010 Robertson Report, page 13;*
- iii. as to subparagraph (iii), December 2008 Robertson Report, page 3; May 2009 Robertson Report, page 7; ITRB Report No. 4, page 1;*
- iv. as to subparagraph (iv), ITRB Report No. 3 (Rev. 1), page 11;*
- v. as to subparagraph (v), ITRB Report No. 3 (Rev. 1), page 9; ITRB Report No. 4, page 4; BHP presentation titled 'Risk Snapshot Samarco Operations' dated November 2012, slide 10.*

~~*Further particulars may be provided after further discovery and filing of expert evidence.*~~

- (gb) independent experts had made recommendations regarding the Fundão Dam which had not been implemented, including that:
- (i) the 826m Blanket Drain be raised along the abutments and/or drainage be installed at the abutments;
 - (ii) a new dike be raised downstream from Dike 1 for additional storage and stability and/or an alternative tailings storage facility be developed as a contingency in case of further structural issues with the Fundão Dam;

Particulars

The Joint Applicants refer to:

- A. as to subparagraph (i), 20 November 2010 Robertson Report, page 5; ITRB Report No. 2, page 6; report of Pimenta dated May 2012 page 24;*
- B. as to subparagraph (ii), April 2011 Robertson Report, page 16; ITRB Report No. 3 (Rev. 1), page 10.*

~~*Further particulars may be provided after further discovery and filing of expert evidence.*~~

- (h) [Deleted.]
- (i) Samarco did not have an emergency action plan in place in the event of failure of one or both of the Main or Secondary Galleries;

Particulars

- i. *The absence of an emergency action plan in the event of failure of one or both of the Main or Secondary Galleries was noted in the ITRB Report No. 3 (Rev. 1), page 13.*
- ii. *The Joint Applicants further refer to ITRB Report No. 1, page 2; ITRB Report No. 2, page 6; BHP presentation titled 'Risk Snapshot Samarco Operations' with speaking notes dated November 2012, page 10.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (ia) the community of Bento Rodrigues was located less than 10 kms downstream of the Fundão Dam and a Samarco study had determined that an uncontrolled release of tailings from the dam could reach the community in less than 10 minutes;

Particulars

- i. *BHP presentation titled 'Risk Snapshot Samarco Operations' with speaking notes dated November 2012, page 11.*
- ii. *Presentation to the Samarco board of directors dated 4 December 2012, slide 24, and minutes of the meeting on 7 December 2012 at section 4.1.2b.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (j) Samarco had not resettled communities living downstream of the Fundão Dam;

Particulars

- i. *Since at least August 2011, Samarco's board of directors had considered relocation of communities located down valley from the Germano Complex (email from Nogueira to Campbell and Uvashni Raman (**Raman**) (BHP, Vice President Finance, Iron Ore) dated 26 July 2011 (BHP00041604); minutes of Samarco board meeting of directors on 10 August 2011 page 3; minutes of Samarco board meeting of directors on 8 Dec 2011, page 6).*
- ii. *On or around 8 August 2012, the board requested that Samarco prioritise efforts to resettle communities living close to tailings dams (minutes of Samarco board of directors meeting on 8 August 2012, page 2).*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (ia) Samarco had assessed that a catastrophic failure of the Fundão Dam with multiple fatalities would cause a maximum foreseeable financial loss to Samarco of around US\$10.9 billion (net present value), based on inter alia an interruption of production at the Germano Complex for a maximum period of 5 years;

Particulars

Document titled 'BHP Billiton Interview May2012 Rev01' dated 4 June 2012.

- (k) further to subparagraphs 40(a)-(j) above:
- (i) Samarco was not safely managing the operation of the Fundão Dam;
 - (ia) ~~there was a heightened risk of the structural integrity of the Fundão Dam being compromised and/or dam failure~~ there were confirmed safety issues with the Fundão Dam;
 - (ib) the safety of the Fundão Dam was significantly inadequate and the dam posed a moderate to high risk, having regard to the combination of likely consequences of a global failure of the Fundão Dam and the probability of global failure;
 - (ic) the Fundão Dam was conditionally unsafe.
 - (ii) ~~[Deleted.] the Germano mining operation was exposed to a heightened risk of interruption arising out of the need to shut down the Fundão Dam due to structural repair works and/or dam failure,~~

Particulars

- i. The matters in subparagraph (i) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) in paragraphs 39 (regarding the safe operation of the Dam) and 40(a)-(ja) above, and paragraph 44 below, and the particulars subjoined thereto.
- ii. The matters in subparagraphs (ia) to (ic) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) pleaded in paragraphs 39 and 40(a)-(ja) above, and paragraph 44 below, and the particulars subjoined thereto.
- iii. ~~[Deleted.] The matters in subparagraph (ii) are to be inferred from the matters in paragraph 39A (regarding the importance of the Fundão Dam for the continued operation of the Germano Complex), and subparagraphs 40(k)(ia) above, and the particulars subjoined thereto.~~
- iv. The Joint Applicants further refer to and rely on Overton Report, Sections 5.2.1, 6.2.1, 7.3.3 and 7.3.4.

~~The Joint Applicants will rely on their geotechnical expert report to be filed in the proceeding and further particulars may be provided after further discovery.~~

(the matters in subparagraphs (a)-(k) cumulatively, to the extent proven, the **August 2012 Information**).

G.3 Problems as at 30 November 2012

41. Following 8 August 2012, and in any event by no later than around 30 November 2012, it was the case that:

- (a) the matters the subject of the August 2012 Information had occurred and/or were continuing;

Particulars

The Joint Applicants refer to the particulars subjoined to paragraphs 40(a)-(k) above.

- (aa) there were further structural problems with the Secondary Gallery, including:

- (i) by around October 2012, significant leakage and cracking had been observed in the Secondary Gallery and inspections revealed defects in construction and remediation;
- (ii) in about November 2012, a sinkhole appeared in the tailings overlying the Secondary Gallery;

Particulars

- i. In about November 2012, a sinkhole appeared in the tailings overlying the Secondary Gallery at the dam (Panel Report, pages 11, B.B8-6). It occurred just upstream of the Setback.*
- ii. The Joint Applicants further refer to ITRB Report No. 5, page 18; ITRB Report No. 6, page 4.*

~~*Further particulars may be provided after further discovery and the filing of expert reports.*~~

- (b) to reduce stresses on the Secondary Gallery and permit works on the Secondary Gallery to occur while continuing to raise the Fundão Dam, the axis of Dike 1 of the Fundão Dam was realigned from the Original Design by setting it back at the left abutment behind the Secondary Gallery (**Setback**);

Particulars

- i. Panel Report at 11.*

ii. ITRB Report No. 5, page 19.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

(c) the Setback:

(i) was constructed over areas where beach encroachment had occurred, or where slimes tailings had been deposited, including as set out in paragraph 40(ea) above;

(ii) ~~[Deleted.] would thereby become less stable as it was raised;~~

(iii) had been undertaken without prior consultation with the ITRB;

Particulars

i. Panel Report at 11, Section 5,

ii. Transcript of testimony of Joaquim Pimenta de Avila, page 30 042 Pimenta KT_243_550_Audio(1).wma.

iii. ITRB Report No. 5, page 19.

iv. As to subparagraphs (i)–(ii), the Joint Applicants further refer to ITRB Report No. 11, page 10-11. This is also to be inferred from the particulars subjoined to paragraph 40(ea) and (f) above, the fact that the Setback moved the crest of the dam upstream from the original axis at the left abutment, and the relative softness and compressibility of slimes tailings.

iva. Further, it is to be inferred from the matters in subparagraph (i) that the Setback would thereby become less stable as it was raised, as to which the Joint Applicants refer to the Overton Report, [303]–[304].

v. As to subparagraph (iii) this is further to be inferred from ITRB Report No. 5, page 19.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

(d) contrary to the matters set out at 39(c) above, the operations manual for the Fundão Dam was not updated to address the Setback;

Particulars

i. 994 Report, page 233.

ii. The 2012 Operations Manual dated 7 July 2012 did not address the Setback and it was not updated in the Relevant Period after that date.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (da) in around late August 2012, a risk analysis conducted by Samarco and external consultants concluded that there was a 10-25% probability of a global rupture of the Fundão Dam in any given year caused by insufficiency of the internal drainage system;

Particulars

Samarco failure modes and effects analysis (FMEA) dated 30 August 2012 prepared by the Samarco GGGT and external consultants, including Mário Cicarelli Pinheiro (Potamos), Ney Amorim (Geostavel), Paulo Franca (VOGBR) and Saulo Gutemberg (Geofast).

- (db) by at least November 2012, the crest of the Fundão Dam had been raised to an elevation of 855 meters;

Particulars

Presentation to the Samarco Performance Management Subcommittee dated November 2012.

- (e) further to subparagraphs 41(a)-(d) above:
- (i) Samarco was not safely managing the operation of the Fundão Dam;
 - (ia) ~~there was a heightened risk of the structural integrity of the Fundão Dam being compromised and/or dam failure~~ there were confirmed safety issues with the Fundão Dam;
 - (ib) the initiation of failure of the Fundão Dam was foreseen and the dam posed a very high risk, having regard to the combination of likely consequences of a global failure of the Fundão Dam and the probability of global failure;
 - (ic) the Fundão Dam was unsafe or potentially unsafe.
 - (ii) [Deleted.] the Germano mining operation was exposed to a heightened risk of interruption arising out of the need to shut down the Fundão Dam due to structural repair works and/or dam failure.

Particulars

- i. *The matters in subparagraph (i) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) in paragraphs 39 and 41(a)-(db) above and paragraph 44 below, and the particulars subjoined thereto.*
- ii. *The matters in subparagraphs (ia)-(ic) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) in paragraphs 39 and 41(a)-(db) above, paragraph 44 below, and the particulars subjoined thereto.*
- iii. *~~[Deleted.] The matters in subparagraph (ii) are to be inferred from the matters in paragraph 39A, and subparagraph (ia) above, and the particulars subjoined thereto.~~*
- iv. *The Joint Applicants further refer to the Overton Report, Section 5.3.1, 6.3.1, 7.4.3 and 7.4.4.*

~~The Joint Applicants will rely on their geotechnical expert report to be filed in the proceeding and further particulars may be provided after further discovery.~~

(~~the matters in~~ subparagraphs (a)-(e) cumulatively, to the extent proven, the **November 2012 Information**).

G.4 Problems after 30 November 2012 and prior to 27 August 2014 up to and including 31 December 2013

42. In the period following 30 November 2012 ~~until around 27 August 2014~~, and by no later than around 31 December 2013, it was the case that:
- (aa) the matters the subject of the November 2012 Information had occurred and/or were continuing;

Particulars

The Joint Applicants refer to the particulars subjoined to paragraphs 41(a)-(e) above.

- (a) the Fundão Dam continued to experience numerous structural and drainage problems, and isolated structural failures, including that:
 - (i) in around January 2013, further cracking was discovered in the Main Gallery;

- (ii) between around March 2013 and December 2013, repeated occurrences of saturation, seepage and upwelling of water were observed near the left abutment in the area of the Setback;
- (iii) the occurrences in subparagraph (ii) above were accompanied, in June and November 2013, by slumping on the downstream slope and, in December 2013, cracks appearing at the left abutment;

Particulars

- i. *[Deleted.]*
- ii. *In about January 2013, a longitudinal crack was discovered in the roof of module 14 of the Main Gallery (ITRB Report No. 6, page 7).*
- iii. *In about February 2013, three-dimensional seepage modelling of the dam at an elevation of 920 metres showed that additional drains would be needed at the abutments if seepage breakouts were to be prevented (Panel Report, page 11, report of VOGBR dated 1 February 2013, page 74).*
- iv. *In about March 2013, seepage and ponding of surface water appeared at the left abutment of the dam at an elevation of 855 metres (Panel Report, pages 11, and B.B8-7; GGB infrastructure report for 25-31 March 2013 at slide 4).*
- v. *In about June 2013, further seepage appeared at the left abutment of the dam at an elevation of 855 metres (Panel Report, pages 11, and B.B8-8 and 9). There were upwellings and surges observed at the left abutment around this time (ITRB report January 2014 (ITRB Report No. 8), page 4).*
- vi. *In about November 2013, further seepage and cracks appeared at the left abutment of the dam (Panel Report, pages 11, and B.B8-10; ITRB Report No. 8, page 4).*
- vii. *In about December 2013, further seepage and upwelling occurred at an elevation of 860 metres and cracking appeared at an elevation of 875 metres at the left abutment (Panel Report, pages 11, and B.B8-11 and 12; GGB infrastructure report for 23-29 December 2013 at slides 7-11; GGB infrastructure report for 30 Dec 2013 - 5 Jan 2014 at slide 5; GGB Monthly Report - Inspection and Management of Fundão Dam for December 2013 at items 121-123).*
- viii. *The Joint Applicants further refer to:*
 - A. *Samarco presentation titled 'Management of Dam Geotechnics, BHP Billiton, Monitoring and Inspection' dated 4 December 2013, at pages 3-4; and*
 - B. *presentation to the Samarco Performance Management Subcommittee dated 31 January 2014, at slide 55.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (b) significant changes from the Original Design had been made to the Fundão Dam, including that the Main and Secondary Galleries were plugged and replaced by alternative spillway drainage;

Particulars

- i. *Between about April 2013 and June 2013, the design of the dam was further revised to include a buried drain for the treatment for seepage and collection of water at the left abutment in front of the Setback, which lead to a rockfill trench at El. 855m on the Setback to convey water across the Setback platform at the left abutment (Panel Report, pages 11, B.B1-23 and 25 and B.B8-7-10).*
- ii. *In about November 2013, the design of the dam was further revised to include a buried drain for the treatment for seepage and collection of water at the left abutment in front of the Setback at El.860m at the left abutment, which connected to the El.855m buried drain (Panel Report, pages 11, B.B1-24).*
- iii. *In about December 2013, the rockfill trench at El.855m was extended by the construction of an open channel which conveyed the water collected from the buried drains at El. 855m and El. 860m across the Setback platform, thereby allowing the continued raising of the left Setback without burying the rockfill trench (Panel Report, page B.B1-26).*
- iiia. *The Main Gallery was decommissioned by plugging in October 2013 (Panel Report, page B.B1-32). The Secondary Gallery was decommissioned by plugging in June 2013 (Panel Report, page B.B1-33). The replacement auxiliary spillway commenced operation in February 2013 (Panel Report, page B.B1-34). The Joint Applicants refer to the: ITRB Report No. 6, page 10; ITRB report dated September 2013 (ITRB Report No. 7), page 9; papers presented to the meeting of the Samarco Performance Management Subcommittee on or around 27 February 2013 at 119).*
- iv. *Between about September 2013 to June 2014, the design of the dam was further revised to include the Vale Toe Drain which collected and conveyed seepage from the Fabrica Nova Waste Pile to an area downstream of Dike 1 (Panel Report, page B.B1-22).*
- v. *Due to concerns about the inadequate capacity of the Auxiliary Spillway that had been constructed to replace the decommissioned Main and Secondary Galleries, it became necessary to construct a further decant structure for the Dike 1 and 2 reservoirs. Construction on the 4th Spillway commenced from around June 2013 and was completed in around September 2015, although the 4th Spillway was operative from around November 2014 (Panel Report, page B.B1-35).*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (c) ~~[Deleted.] structural problems continued to arise, notwithstanding earlier attempts by Samarco to address structural issues, including in or around July 2014, upwelling in or around the downstream slope of the right abutment;~~

Particulars

- i. ~~In about July 2014, seepage appeared at the right abutment of the dam at an elevation of 855 metres (Panel Report, pages B.B8-13 and 14; ITRB Report dated July 2010 (ITRB Report No. 10), section 4).~~*
- ii. ~~This followed a series of ongoing structural problems, as to which the Joint Applicants refer to paragraphs 40(a) and 42(a) above.~~*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

(d) [Deleted.]

- (da) in order to create additional tailings storage capacity, Samarco was continuing to pursue a plan for the future raising of the Fundão Dam (together with the Germano dam) to an elevation of 940 meters, being 20 meters higher than the Original Design (**Project 940**);

Particulars

- i. The incidents referred to in paragraph 42(a) above and the 826m Blanket Drain reaching capacity, referred to at paragraph 42A(ej) below, coincided with plans for Project 940 (Panel Report, page 13).*
- ii. The Joint Applicants refer to:*
 - A. BHP presentation to the Samarco pre-board meeting on 7 August 2012, slide 6;*
 - B. presentation titled 'Risk Snapshot Samarco Operations' dated November 2012, slide 12;*
 - C. Samarco 5 year plan dated July 2013, pages 81-82;*
 - D. presentation to the Samarco board of directors meeting on 4 December 2013, page 47-48;*
 - E. ITRB report dated February 2014 (ITRB Report No. 9), page 2;*
 - F. report of the Samarco board of directors meeting on 2 April 2014, page 27;*
 - G. BHP presentation to the Samarco pre-board meeting on 13 August 2013 titled "Samarco 5-Year Plan", slides 23-26.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (daa) in around May 2013, a risk analysis conducted by Samarco and external consultants concluded that there was a 25-50% probability of a global rupture of the Fundão Dam in any given year caused by insufficiency of the internal drainage system;

Particulars

Samarco FMEA dated 21 May 2013 prepared by the Samarco GGGT and external consultants, including Saulo Gutemberg (Geofast), Ney Amorim (Geostavel), Wilson Lugão (VOGBR), José Mário Mafra (Golder Associates Brasil) and Mário Cicarelli Pinheiro (Potamos).

- (db) an audit of Samarco by the RAA audit function between around June to September 2013 concluded that:
 - (i) deficiencies in Samarco's QA and QC processes had led to the Piping and Gallery Incidents; these deficiencies had not been identified by Samarco or the ITRB, and Samarco lacked awareness about the relevance of QA and QC systems to prevent defects in tailings dam construction; and there was no plan to effectively address those deficiencies to prevent similar incidents during Project 940;
 - (ii) if QC and QA systems failed to identify defects in the implementation of Project 940, incidents similar to the Piping Incident may occur and develop into a catastrophic rupture of the dam;
 - (iii) ITRB recommendations were not being implemented by Samarco and the reasons for not doing so were not documented;

Particulars

i. FY14 Technical Audit Report, pages 6, 14-16.

ii. Group RAA Detailed Test Work Papers 4100-1900 to 4410-1909.

~~*Further particulars may be provided after further discovery and the filing of expert reports.*~~

- (e) the Setback:
 - (i) continued to be used despite:
 - (A) the matters set out in paragraph 41(c) above;
 - (B) the ongoing structural and drainage problems and isolated structural failures encountered at the left abutment of the dam

set out in paragraph 42(a) above, to which the Setback was proximate;

Particulars

The Joint Applicants refer to the particulars subjoined to paragraph 42(a) above.

(C) [Deleted.]

(ii) grew significantly larger;

Particulars

- i. *In 2013, the height of the Setback rose at an average rate of 18 metres per year, and in the month of September 2013, the height rose by 3 metres, a monthly record (Panel Report, page 13).*
- ii. *The growth of the Setback is further inferred from the fact that the Setback remained in place and the continuing increase in the overall height of the Fundão Dam (including as to the continuation of that matter, as pleaded below), as to which the Joint Applicants refer to:*
 - A. *ITRB Report No. 5, which recorded that the elevation of Dike 1 in October 2012 was 849 meters;*
 - B. *ITRB Report No. 7, page 4, which recorded that the elevation of Dike 1 in September 2013 was 870 meters; and*
 - C. *the presentation to the Operations Committee on 19 August 2014, slides 37, 39, which recorded that the elevation of the dam was 882.5 meters, with an intended raise of 891.26 meters by December 2014;*
 - D. *Samarco presentation titled, 'BHP Billiton visit – Samarco risk management – risk of rupture of dams' dated 16 May 2012, page 5.*
 - E. *presentation to the Samarco Performance Management Subcommittee dated 14 November 2012, page 82;*
 - F. *presentation to the Samarco board dated 4 December 2012, slide 7;*
 - G. *presentation to the Samarco Performance Management Subcommittee dated 30 September 2013, slide 48;*
 - H. *minutes of the meeting of the Samarco Performance Management Subcommittee on 31 January 2014, page 6;*
 - I. *presentation to the Samarco Performance Management Subcommittee dated 31 January 2014, at slide 55;*
 - J. *presentation to the Samarco board dated 2 April 2014, page 48;*
 - K. *presentation to the Samarco Performance Management Subcommittee dated 15 May 2014, slide 78;*
 - L. *presentation to the Samarco Performance Management Subcommittee dated 13 June 2014, slide 57.*

~~Further particulars may be provided after further discovery and the filing of expert~~

~~reports.~~

- (iii) as it grew larger, became underlain by slimes in the interbedded region;

Particulars

- i. Panel Report, page 45.
- ii. ITRB Report No. 11, page 10.
- iii. This is also to be inferred from the particulars subjoined to paragraph 40(ea) and (f) above, the fact that the Setback moved the crest of the dam upstream from the original axis at the left abutment, and the relative softness and compressibility of slimes tailings.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (f) there were continuing significant increases in the volume of tailings being deposited in the Fundão Dam, including by Vale;

Particulars

- i. The Joint Applicants refer to the particulars subjoined to paragraph 40(d) above, which matters continued to arise in the period from 30 November 2012 onwards.
- ii. The increase in tailings was attributable, in part, to pellet production commencing in March 2014 under the P4P Project. The Joint Applicants refer to the matters in paragraph 38A above.
- iii. As to the continuing increases in the volume of tailings being deposited in the Fundão Dam (including as to the continuation of that matter, as pleaded below), the Joint Applicants further refer to:
 - A. particulars D, F, H, I, M and N to paragraph 42(e)(ii) above;
 - B. the email from Ferreira to Jacques dated 22 August 2014 (BHP00080732) attaching actual/forecast tailings deposits of 12.98 million cubic meters for 2013 and 17.74 million cubic meters for 2014;
 - C. presentation to the Samarco Performance Management Subcommittee dated 9 July 2013, slide 83;
 - D. presentation to the Samarco Performance Management Subcommittee dated 24 October 2013, slide 54;
 - E. presentation to the BHP Iron Ore Executive Committee dated 9 January 2014, slide 7;
 - F. presentation to the Samarco Performance Management Subcommittee dated 7 August 2014, slide 97.
- iv. As to the continuing deposits of tailings in the Fundão Dam by Vale, the Joint Applicants further refer to ITRB Report No. 6, page 4, ITRB Report No. 7, page 4.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (fa) by at least around September 2013, the crest of the Fundão Dam had been raised to an elevation of 870 meters;

Particulars

ITRB Report No. 7, page 4.

- (g) [Deleted.]
- (h) there were continuing breaches of the Minimum Beach Width requirement;

Particulars

- i. *The Overflow Channel was operative for a second period between July 2013 and December 2013, once the Setback was in place. This contributed to the diminishment of the length of the beach, and particularly impacted the beach area already shortened due to the retreat of the dam axis towards the rear part of the reservoir: 994 Report, page 326.*
- ii. Panel Report, Figure 2-9.
- iii. The Joint Applicants further refer to (including as to the continuation of this matter, as pleaded below):
 - A. the emails between Fernandes and Ferreira on 27 and 28 January 2015 (BHP00261051, BHP00252966);
 - B. Samarco GGB Monitoring of Waste Disposal Planning Meeting Report dated 8 July 2013, page 9;
 - C. presentation to the Samarco Performance Management Subcommittee dated 30 September 2013, slide 50;
 - D. presentation to the Samarco Performance Management Subcommittee dated 24 October 2013, slide 57;
 - E. presentation to the Samarco Operations Committee dated 13 November 2013, slide 32;
 - F. presentation to the Samarco Operations Committee dated 15 May 2014, page 77;
 - G. presentation to the Samarco Performance Management Subcommittee dated 13 June 2014, slide 56;
 - H. presentation to the Samarco Performance Management Subcommittee dated 7 August 2014, slide 99;
 - I. presentation to the Samarco Performance Management Subcommittee dated 21 October 2014, slide 68 [page 59];
 - J. presentation to the Samarco Operations Committee dated 19 November 2014, slide 43;
 - K. Samarco GGB Monitoring of Waste Disposal Planning Meeting Report dated 9 December 2014, slide 20;

- L. Samarco GGB Monitoring of Waste Disposal Planning Meeting Report dated 14 January 2015, slide 19;
- M. presentation to the Samarco Performance Management Subcommittee dated 10 February 2015, slide 75;
- N. presentation to the Samarco Operations Committee dated 10 July 2015, slide 30;
- O. presentation to the Samarco Performance Management Subcommittee dated 10 September 2015, slide 95;
- P. minutes of the meeting of the Samarco Performance Management Subcommittee on 10 September 2015, page 9.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (i) ~~[Deleted.] the internal drainage of the Fundão Dam was not operating in accordance with the Original Design and/or there was saturation of sand tailings to an extent that was not anticipated in the Original Design;~~

Particulars

- ~~i. Panel Report, section 4.3.~~
- ~~ii. The Joint Applicants refer to the matters in paragraph 40(g) and the particulars subjoined thereto, paragraphs 42(a) above and 42(j) and (ja) below, and the particulars subjoined thereto.~~
- ~~iii. This is also to be inferred from the failure modes and effects analysis (FMEA) contained in a presentation to the meeting of the Samarco board of directors on 4 April 2013, page 20, which identified that of 42 failure modes, 16 were “above the risk level considered tolerable” and identified the “main issues” as “internal drainage system”, “inefficient spillway system”, and “failure of galleries”.~~

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (j) ~~[Deleted.] by around January 2014:~~
 - ~~(i) it had become apparent that the 826m Blanket Drain had reached its capacity to drain the tailings in the Fundão Dam;~~
 - ~~(ii) the ITRB recommended the installation of additional blanket drains to drain the tailings in the body of the dam, and abutment drains;~~

Particulars

- ~~i. Panel Report, page 13.~~
- ~~ii. The widening of the dam embankment and impoundment relative to the 826m Blanket Drain, as referred to in the particulars subjoined to paragraph~~

~~40(g) above, had continued, with its detrimental effects becoming increasingly pronounced (Panel Report, pages 29-31).~~

~~iii. ITRB Report No. 8, page 5.~~

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (ja) ~~[Deleted.] in around July 2014, a risk analysis conducted by Samarco and external consultants concluded that there was a 25-50% probability of a global rupture of the Fundão Dam in any given year caused by insufficiency of the internal drainage system;~~

Particulars

~~i. Samarco FMEA dated 16 July 2014 prepared by the Samarco GGGT and external consultants, including Paulo Franca (VOGBR), Ney Amorim (Geostavel) and Mário Cicarelli (Potamos).~~

~~ii. ITRB Report No. 11, page 13.~~

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (jb) ~~[Deleted.] despite the matters set out in paragraphs 42(a), (c), (f), (j), and (ja) above:~~

~~(i) Samarco had not implemented the recommendations set out at paragraph 40(gb)(i) above to raise the 826m Blanket Drain along the abutments;~~

~~(ii) no additional blanket drains were installed and/or operating to drain the tailings deposited in the Fundão Dam and/or at the left abutment upstream of the Setback;~~

Particulars

~~The Joint Applicants refer to:~~

~~i. ITRB Report No. 8, page 5;~~

~~ii. The FMEA dated 16 July 2014 records the only actions in response to the risk identified at paragraph 42(ja) as the continuation of previous studies to verify the need for implementation of "abutment drains (additional drainage system)".~~

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (k) ~~[Deleted.]~~

(l) [Deleted.]

(la) in around November 2013, a risk analysis conducted by Samarco and external consultants concluded that there was a 25-50% probability of a global rupture of the Fundão Dam in any given year caused by insufficiency of the internal drainage system;

Particulars

Samarco FMEA dated 27 November 2013 prepared by the Samarco GGGT and external consultants, including Terezinha Espósito (UFMG), Paulo Franca (VOGBR), Saulo Gutemberg (Geofast), Leonardo Ventura (Geostavel) and Rodney Tagliati (Potamos).

(m) Samarco had decided not to resettle communities living downstream of the Fundão Dam;

Particulars

i. *The Joint Applicants refer to:*

- A. *the report for the meeting of the Samarco board of directors on 14 August 2013, page 35, which contained the findings of a report that proposed that the Bento Rodrigues community not be relocated; and*
- B. *email chain between Corless and Fernandes dated 6 November 2014 (BHP-000105441), in which Fernandes stated that Samarco was unable to implement a comprehensive relocation strategy to relocate the community of Bento Rodrigues in the short term.*

ii. *It is inferred from these matters that a decision not to relocate the community of Bento Rodrigues was made by at least around August 2013.*

~~*Further particulars may be provided after further discovery and the filing of expert reports.*~~

(n) further to subparagraphs 42(a)-(m) above:

(i) Samarco was not safely managing the operation of the Fundão Dam;

(ia) ~~there was a very high risk of the structural integrity of the Fundão Dam being compromised and/or dam failure including the possibility of a global failure and uncontrolled tailings outflow~~ there were confirmed safety issues with the Fundão Dam;

- (ib) the Fundão Dam posed an extremely high risk, having regard to the combination of likely consequences of a global failure of the Fundão Dam and the probability of global failure;
- (ic) the Fundão Dam was unsafe;
- (ii) ~~[Deleted.] the Germano mining operation was exposed to a very high risk of interruption arising out of the need to shut down the Fundão Dam due to the need to perform structural repair works and/or dam failure,~~

Particulars

- i. The matters in subparagraph (i) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) in paragraph 39 (regarding the safe operation of the Dam) and 42(aa)-(m) above and paragraph 44 below, and the particulars subjoined thereto.
- ii. The matters in subparagraphs (ia)-(ic) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) pleaded in paragraph 39 and 42(aa)-(ib)(m) above and paragraph 44 below, and the particulars subjoined thereto.
- iii. ~~[Deleted.] The matters in subparagraph (ii) are to be inferred from the matters in paragraph 39A and 42(n)(ia) above, and the particulars subjoined thereto.~~
- iv. The Joint Applicants further refer to the Overton Report, Sections 4.2.1, 5.4.1, 6.4.1, 7.5.3 and 7.5.4.

~~The Joint Applicants will rely on their geotechnical expert report to be filed in the proceeding and further particulars may be provided after further discovery.~~

~~(the matters in subparagraphs (aa)-(n) cumulatively, to the extent proven, the **Pre-27 August 2014 December 2013 Information**).~~

G.4A Problems after 31 December 2013 and up to and including 31 July 2014

42A. In the period following 31 December 2013, and by no later than around 31 July 2014, it was the case that:

- (a) the matters the subject of the December 2013 Information had occurred and/or were continuing;
- (b) by around January 2014:
 - (i) it had become apparent that the 826m Blanket Drain was inoperable or inefficient at controlling water levels in the dam at the left abutment;

- (ii) the ITRB recommended the installation of additional blanket drains to drain the tailings in the body of the dam, and abutment drains;

Particulars

- i. Panel Report, page 13.
 - ii. The widening of the dam embankment and impoundment relative to the 826m Blanket Drain, as referred to in the particulars subjoined to paragraph 40(g) above, had continued, with its detrimental effects becoming increasingly pronounced (Panel Report, pages 29-31).
 - iii. ITRB Report No. 8, page 5.
 - iv. Presentation to the Samarco Performance Management Subcommittee dated 31 January 2014, slide 55.
- (c) the internal drainage of the Fundão Dam was not operating in accordance with the Original Design and/or there was saturation of sand tailings to an extent that was not anticipated in the Original Design;

Particulars

- i. Panel Report, section 4.3.
 - ii. The Joint Applicants refer to the matters in paragraph 40(g) and the particulars subjoined thereto, paragraphs 42(a) and 42A(b) above, and 42A(e)-(g) below, and the particulars subjoined thereto.
 - iii. This is also to be inferred from the FMEA contained in a presentation to the meeting of the Samarco board of directors on 4 April 2013, page 20, which identified that of 42 failure modes, 16 were “above the risk level considered tolerable” and identified the “main issues” as “internal drainage system”, “inefficient spillway system”, and “failure of galleries”.
- (d) by at least June 2014, the crest of the Fundão Dam had been raised to an elevation of 882.5 meters;

Particulars

- i. The presentation to the Operations Committee on 19 August 2014, slide 37.
 - ii. GGB monthly report dated June 2014, slide 0014.
- (e) in around July 2014, a risk analysis conducted by Samarco and external consultants concluded that there was a 25-50% probability of a global rupture

of the Fundão Dam in any given year caused by insufficiency of the internal drainage system;

Particulars

- i. Samarco FMEA dated 16 July 2014 prepared by the Samarco GGGT and external consultants, including Paulo Franca (VOGBR), Ney Amorim (Geostavel) and Mário Cicarelli (Potamos).
 - ii. ITRB Report No. 11, page 13.
- (f) despite the matters set out in paragraphs 42(a), (daa), (f) and (fa) and 42A(b) to (e) above:

- (i) Samarco had not implemented the recommendations set out at paragraph 40(gb)(i) above to raise the 826m Blanket Drain along the abutments;
- (ii) no additional blanket drains were installed and/or operating to drain the tailings deposited in the Fundão Dam and/or at the left abutment upstream of the Setback;

Particulars

The Joint Applicants refer to:

- i. ITRB Report No. 8, page 5;
 - ii. The FMEA dated 16 July 2014 records the only actions in response to the risk identified at paragraph 42(ja) as the continuation of previous studies to verify the need for implementation of “abutment drains (additional drainage system)”;
 - iii. presentation to the Samarco Performance Management Subcommittee dated 31 January 2014, at page 55;
 - iv. minutes of the meeting of the Samarco Performance Management Subcommittee on 31 January 2014, page 5.
- (g) structural problems continued to arise, notwithstanding earlier attempts by Samarco to address structural issues, including in or around July 2014, upwelling in or around the downstream slope of the right abutment;

Particulars

- i. In about July 2014, seepage appeared at the right abutment of the dam at

an elevation of 855 metres (Panel Report, pages B.B8-13 and 14; ITRB Report dated July 2010 (ITRB Report No. 10), section 4).

ii. This followed a series of ongoing structural problems, as to which the Joint Applicants refer to paragraphs 40(a) and 42(a) above.

(h) further to subparagraphs 42A(a)-(g) above:

(i) Samarco was not safely managing the operation of the Fundão Dam;

(ii) there were confirmed safety issues with the Fundão Dam;

(iii) the Fundão Dam posed an extremely high risk, having regard to the combination of likely consequences of a global failure of the Fundão Dam and the probability of global failure;

(iv) the Fundão Dam was unsafe.

Particulars

i. The matters in subparagraph (i) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) in paragraph 39 (regarding the safe operation of the Dam) and 42A(a)-(g) above and paragraph 44 below, and the particulars subjoined thereto.

ii. The matters in subparagraphs (ii)-(iv) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) pleaded in paragraph 39 and 42A(a)-(g) above and paragraph 44 below, and the particulars subjoined thereto.

iii. The Joint Applicants further refer to the Overton Report, Sections 4.2.1, 5.4.1, 6.5.1, 7.6.3 and 7.6.4.

(the matters in subparagraphs (a) to (h) cumulatively, to the extent proven, the July 2014 Information).

G.5 Problems from 27 August 2014 onwards after 31 July 2014 up to and including 20 November 2014

43. At all material times from 27 August 2014 until the time of the Fundão Dam's collapse on 5 November 2015 (Brazilian time) In the period following 31 July 2014, and by no later than around 20 November 2014, it was the case that:

(a) the matters the subject of the Pre-27 August July 2014 Information had occurred and/or were continuing;

Particulars

The Joint Applicants refer to the particulars subjoined to paragraphs 42A(a)-(h) ~~(aa)-(n)~~ above.

- (b) in late August 2014:
 - (i) a series of cracks were discovered in the Fundão Dam at the Setback near the left abutment which:
 - (A) were more extensive than any that had occurred previously at the dam;
 - (B) opened at the dam crest and extended back to the beach behind the crest, to the edges of the dam, and down the downstream face;
 - (ii) the cracks were accompanied by upwelling and significant flow in an area downstream of the toe of the slope of the dam;

Particulars

- i. Panel Report, pages 14-15.*
- ii. ITRB Report No. 11, pages 10-11.*

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (c) [Deleted.] in about September 2014 and December 2014, Pimenta:
 - (i) ~~inspected the Fundão Dam;~~
 - (ii) ~~during the above inspection, observed cracking at a retreat dike;~~
 - (iii) ~~advised Samarco that based on his inspection, static liquefaction could be present at the Fundão Dam;~~
 - (iv) ~~further advised Samarco that a reinforcement embankment for the foundation slope, which Samarco was constructing in order to stabilise the areas affected by the structural incidents in late August 2014~~
(Reinforcement Berm):
 - (A) ~~needed to be constructed in a manner which properly had regard to the risk of static liquefaction being present;~~

- (B) ~~did not, as at 15 December 2014, meet the above requirement;~~
- (v) ~~made various recommendations to Samarco as to how to address the situation;~~

Particulars

- ~~i. Pimenta inspected the dam on or around 4 September 2014 and 15 December 2014.~~
- ~~ii. Pimenta issued reports to Samarco regarding the above inspections, in which he advised as to the possibility of static liquefaction and suggested various steps be taken to address the situation.~~
- ~~iii. In his report issued following the September inspection, Pimenta made various recommendations such as verifying that a reinforcement embankment for the foundation slope, which Samarco was constructing in order to stabilise the areas affected by the structural incidents in late August 2014 (**Reinforcement Berm**) would adequately address potential static liquefaction; installing piezometers to assist with stability analysis; and monitoring the levels of piezometers daily.~~
- ~~iv. In his report issued following the December inspection, Pimenta made various recommendations relating to the construction having regard to the possibility of static liquefaction, and inclusion of additional drainage. He made criticisms of the Reinforcement Berm, such as noting that the berm initially constructed still did not meet recommended safety stipulations.~~

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (d) ~~[Deleted.] Samarco did not follow all of Pimenta's above recommendations.~~

Particulars

~~As best as the Joint Applicants can say prior to further discovery, Samarco did not follow recommendations by Pimenta for:~~

- ~~i. there to be daily monitoring of piezometer data;~~
- ~~ii. the Reinforcement Berm to be constructed subject to certain safety stipulations to account for the possible presence of static liquefaction;~~
- ~~iii. [Deleted.]~~

~~Further particulars may be provided after the completion of further discovery and the filing of expert reports.~~

- (e) on or about 20 November 2014, the ITRB:

- (i) recorded that:

- (A) the cracks referred to in paragraph 43(b) above may have been caused by a rupture through tailings below the raises of the dam;

- (B) the Setback had led to the construction of the dam raises on top of slimes;
- (C) there was a higher phreatic surface in the area of the cracking;
- (ii) recommended that work be undertaken as quickly as possible, and that every effort be made to prioritise the completion of the work, to enable the axis at the Setback to be returned to its intended position under the Original Design;

Particulars

ITRB Report No. 11, page 11.

- (f) ~~Samarco did not follow this recommendation, and instead:~~
 - (i) ~~initially~~ estimated that the return of the axis at the Setback would take a year;
 - (ii) ~~subsequently, and by no later than 6 April 2015, further delayed the completion of the recommended works to allow the design and construction of an additional drainage system, including in the Grota da Vale, as part of Project 940;~~

Particulars

- i. ITRB Report No. 11, pages 10-11.*
- ii. ~~ITRB report dated 6 April 2015 (ITRB Report No. 12), page 3.~~*
~~Further particulars may be provided after the completion of further discovery and the filing of expert reports.~~

- (fa) there were continuing significant increases in the volume of tailings being deposited in the Fundão Dam and the height of the dam grew significantly larger;

Particulars

- i. This is to be inferred from the matters in paragraphs 38A and 39A above.*
- ii. The Joint Applicants further refer to:*
 - A. presentation to Samarco's Operations Committee meeting on 19 November 2014, page 42, which records the elevation of the Fundão Dam at the left and right abutments as 885.5 meters;*
 - B. ~~Samarco's Tailings Disposal Plan 2015 dated December 2014;~~*
 - C. ~~presentation to Samarco's Operations Committee meeting on 10 July 2015, page 29, which records the elevation of the Fundão Dam at the~~*

~~left and right abutments as 894 meters.~~

~~Further particulars may be provided after the completion of further discovery and the filing of expert reports.~~

- (faa) by at least October 2014, the crest of the Fundão Dam had been raised to an elevation of 885.5 meters;

Particulars

The Joint Applicants refer to and repeat particular (ii) to paragraph 43(fa) above.

- (fb) other than the 826m Blanket Drain, no additional blanket drains were operating to drain the tailings deposited in the Fundão Dam and/or at the left abutment upstream of the Setback;

Particulars

- i. ~~As best as the Joint Applicants can say prior to further discovery,~~ Samarco undertook construction of an additional blanket drain at elevation 860 meters on the plateau downstream in front of the Setback (**860m Blanket Drain**) between around November 2014 to around August 2015. This was the first stage in a three-stage additional drainage system to be constructed as part of Project 940 to raise the Fundão and Germano dams, and was to connect to a second blanket drain to be constructed in the Grotta da Vale (Panel Report, B.B1-27). As the 860m Blanket Drain was being constructed on the plateau of already deposited tailings downstream of the Setback (the completion of which was delayed pending the completion of stages one and two of the additional drainage program) it had little or no effect ~~on draining the tailings that had been and were continuing to be deposited in the Fundão Dam and/or at~~ in reducing the level of saturation at the left abutment upstream of the Setback prior to the failure of the dam on 5 November 2015 (Brazilian time) (Panel Report, page 33).
- ii. The Joint Applicants refer to:
 - A. presentation to the Samarco Performance Management Subcommittee dated 31 January 2014, page 55;
 - B. minutes of the meeting of the Samarco Performance Management Subcommittee on 31 January 2014, page 5;
 - C. presentation to the Samarco Performance Management Subcommittee dated 21 October 2014, slide 64;
 - D. ITRB Report No. 11, page 4;
 - E. VOGBR report to Samarco dated 29 October 2014, section 8.0;
 - F. Project 940 Project Execution Plan dated 25 February 2015, Chapter 8 "Construction".

~~Further particulars may be provided after the completion of further discovery and the filing of expert reports.~~

- (fc) Samarco was continuing, and intended to continue, production at the Germano eComplex;

Particulars

The Joint Applicants refer to the matters in paragraph 38A above and the absence of any plan or decision by the Samarco board of directors or its shareholders including BHP to cease production.

~~*Further particulars may be provided after the completion of further discovery and the filing of expert reports.*~~

- (g) further to subparagraphs 43(a)-(fc) above:
- (i) Samarco was not safely managing the operation of the Fundão Dam;
 - (ia) ~~the structural integrity of the dam was compromised~~ there were confirmed safety issues with the Fundão Dam;
 - (ib) ~~there was an extreme risk of failure of the Fundão Dam including the possibility of a global failure and uncontrolled tailings outflow~~ the Fundão Dam was critically near failure and the dam posed an extremely high risk, having regard to the combination of likely consequences of a global failure of the Fundão Dam and the probability of global failure;
 - (ic) the Fundão Dam was unsafe;
 - (ii) ~~[Deleted.] the Germano mining operation was exposed to an extreme risk of interruption arising out of the need to shut down the Fundão Dam due to structural repair works and/or global dam failure;~~
 - (iii) [Deleted.]

Particulars

- i. *The matters in subparagraph (i) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) in paragraphs 39, 43(a)-(fc) above and paragraph 44(a)-(c) below, and the particulars subjoined thereto.*
- ii. *The matters in subparagraph (ia) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) pleaded in paragraphs 39 and 43(a)-(fc) above and paragraph 44 below, and the particulars subjoined thereto.*
- iii. *The matters in subparagraph (ib) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) pleaded in paragraphs 39 and 43(a)-(fc) above and paragraph 44 below, and the*

particulars subjoined thereto.

- iv. The matters in subparagraph (ic) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) pleaded in paragraphs 39 and 43(a)-(fc) above and paragraph 44 below, and the particulars subjoined thereto.
- v. ~~[Deleted.] The matters in subparagraph (ii) are to be inferred from the matters in paragraph 39A and subparagraphs (ia) and (ib) above, and the particulars subjoined thereto.~~
- vi. The Joint Applicants further refer to the Overton Report, Sections 4.3.1, 5.5.1, 6.6.1, 7.7.3 and 7.7.4.

~~The Joint Applicants will rely on their geotechnical expert report to be filed in the proceeding and further particulars may be provided after further discovery.~~

(the matters in subparagraphs (a)-(g) cumulatively, to the extent proven, the **Post-August November 2014 Information**).

G. 5A Problems after 20 November 2014

43A. In the period following 20 November 2014, and by no later than around 6 April 2015, it was the case that:

- (a) the matters the subject of the November 2014 Information had occurred and/or were continuing;
- (b) in about September 2014 and December 2014, Pimenta:
 - (i) inspected the Fundão Dam;
 - (ii) during the above inspection, observed cracking at the Setback;
 - (iii) advised Samarco that based on his inspection, static liquefaction could be present at the Fundão Dam;
 - (iv) further advised Samarco that a reinforcement embankment for the foundation slope, which Samarco was constructing in order to stabilise the areas affected by the structural incidents in late August 2014:
 - (A) needed to be constructed in a manner which properly had regard to the risk of static liquefaction being present;
 - (B) did not, as at 15 December 2014, meet the above requirement;

- (v) made various recommendations to Samarco as to how to address the situation;

Particulars

- i. Pimenta inspected the dam on or around 4 September 2014 and 15 December 2014.
- ii. Pimenta issued reports to Samarco regarding the above inspections, in which he advised as to the possibility of static liquefaction and suggested various steps be taken to address the situation.
- iii. In his report issued following the September inspection, Pimenta made various recommendations such as verifying that a reinforcement embankment for the foundation slope, which Samarco was constructing in order to stabilise the areas affected by the structural incidents in late August 2014 (**Reinforcement Berm**) would adequately address potential static liquefaction; installing piezometers to assist with stability analysis; and monitoring the levels of piezometers daily.
- iv. In his report issued following the December inspection, Pimenta made various recommendations relating to the construction having regard to the possibility of static liquefaction, and inclusion of additional drainage. He made criticisms of the Reinforcement Berm, such as noting that the berm initially constructed still did not meet recommended safety stipulations.

- (c) Samarco did not follow all of Pimenta's above recommendations;

Particulars

As best as the Joint Applicants can say prior to further discovery, Samarco did not follow recommendations by Pimenta for:

- i. there to be daily monitoring of piezometer data;
- ii. the Reinforcement Berm to be constructed subject to certain safety stipulations to account for the possible presence of static liquefaction.

- (d) by no later than 6 April 2015, Samarco further delayed the completion of the recommended works referred to in paragraph 43(e)(ii) to allow the design and construction of an additional drainage system, including in the Grota da Vale, as part of Project 940;

Particulars

The Joint Applicants refer to:

- i. Samarco Project 940 Execution Plan dated 25 February 2015, Chapter 8 "Construction", pages 34-45;
- ii. email from Daviely Rodrigues Silva to Ferreira dated 28 January 2015

(BHP00261051);

iii. ITRB report dated 6 April 2015 (ITRB Report No. 12), page 3.

- (e) there were continuing significant increases in the volume of tailings being deposited in the Fundão Dam and the height of the dam grew significantly larger;

Particulars

- i. This is to be inferred from the matters in paragraphs 38A and 39A above.
- ii. The Joint Applicants further refer to:
- A. Samarco's Tailings Disposal Plan 2015 dated December 2014;
- B. presentation to Samarco's Operations Committee meeting on 10 July 2015, page 29, which records the elevation of the Fundão Dam at the left and right abutments as 894 meters;
- C. presentation to the Samarco Performance Management Subcommittee dated 13 March 2015, which records the elevation of the Fundão Dam at the left and right abutments as 890.5 meters.
- (f) by at least February 2015, the crest of the Fundão Dam had been raised to an elevation of 890.5 meters;

Particulars

The Joint Applicants refer to and repeat particular (ii)(B) to paragraph 43A(e) above.

- (g) Samarco was continuing, and intended to continue, production at the Germano Complex;

Particulars

The Joint Applicants refer to and repeat the particulars to paragraph 43(fc) above.

- (h) further to subparagraphs 43A(a)-(g) above:
- (i) Samarco was not safely managing the operation of the Fundão Dam;
- (ii) there were confirmed safety issues with the Fundão Dam;

- (iii) the Fundão Dam was critically near failure and the Fundão Dam posed an extremely high risk, having regard to the combination of likely consequences of a global failure of the Fundão Dam and the probability of global failure;
- (iv) the Fundão Dam was unsafe,

Particulars

- i. The matters in subparagraph (i) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) in paragraphs 39, 43A(a)-(g) above, and paragraph 44 below, and the particulars subjoined thereto.
- ii. The matters in subparagraph (ii)-(iv) are to be inferred from the matters (cumulatively to the extent proven, or any subset thereof) pleaded in paragraphs 39 and 43A(a)-(g) above and paragraph 44 below, and the particulars subjoined thereto.
- iii. The Joint Applicants further refer to the Overton Report, Sections 4.4.1, 5.6.1, 6.7.1, 7.8.3 and 7.8.4.

(the matters in subparagraphs (a)-(h) cumulatively, to the extent proven, **the April 2015 Information**).

G.6 Consequential risks

44. At all material times, it was likely that a global failure of the Fundão Dam and uncontrolled tailings outflow would cause:
- (a) ~~loss of life, potentially on a large scale:~~
 - (i) 5 fatalities;
 - (ii) alternatively, 10 fatalities;
 - (iii) alternatively, 100 fatalities;
 - (b) serious adverse impacts to land and property downstream, including in the community of Bento Rodrigues;
 - (c) serious adverse impacts to the environment and water resources downstream;

Particulars

The likelihood of those consequences in subparagraphs (a) to (c) arose by reason of, and/or were evidenced by, or are to be inferred from, inter alia, the following matters:

- i. the matters set out in paragraphs 35-37;*
- ii. the failure to relocate residents of the nearby Bento Rodrigues and the failure to implement an appropriate emergency action plan, as to which the Joint Applicants refer to paragraphs 40(i)-(j), 41(a), 42(m) and 43(a) above;*
- iii. the potential toxicity of tailings stored in the Fundão Dam;*
- iv. the large size of the Fundão Dam, and the large and increasing volume of tailings stored within the dam from the Germano Complex including as a result of the P4P Project, and from Vale's nearby mining operations, as to which the Joint Applicants refer to paragraphs 40(d), 42(f) and 43(fa) above;*
- v. the known scale and seriousness of damage caused by reported collapses of other tailings dams prior to the Relevant Period-;*
- vi. as to subparagraph (a)(i), the Joint Applicants refer to:*
 - A. BHP Bow-Tie Risk Assessment dated 25 April 2012;*
 - B. BHP Samarco Business Group Risk and Audit Committee (BRAC) Risk Management Report dated June 2012, slide 6;*
 - C. BHP Iron Ore RAC Risk Management Report dated August 2012, slide 9;*
 - D. BHP Samarco Operations Risk Profile presentation dated August 2012, slide 4;*
 - E. papers for the meeting of the BHP GMC on 2 October 2012, page 29;*
 - F. BHP presentation titled 'Risk Snapshot Samarco Operations' dated November 2012, page 23;*
 - G. papers for the BHP Iron Ore FY13 Directional Appraisal on 22 November 2012, page 21;*
 - H. BHP Bow-Tie Risk Assessment dated 25 February 2013;*
 - I. BHP Brazil Risk Register dated 22 July 2013;*
- vii. as to subparagraph (a)(ii), the Joint Applicants refer to:*
 - A. BHP Iron Ore Executive Committee report dated October 2011, page 55;*
 - B. BHP Iron Ore Business Group Risk and Audit Committee report dated 27 January 2012, page 128;*
 - C. BHP Iron Ore Executive Committee report dated 15 March 2012, page 60;*
 - D. papers for the meeting of the BHP GMC on 22 May 2012, page 54;*
 - E. BHP HSEC Risk Profile Report to the BHP Sustainability Committee dated June 2012, page 6;*

F. BHP Iron Ore Executive Committee report dated 11 June 2012, page 59;

viii. as to subparagraph (a)(iii), the Joint Applicants refer to:

A. Samarco Bow-Tie Risk Assessment dated 1 June 2010;

B. BHP Iron Ore Strategy & Development FY12 5 Year Plan dated 17 February 2011, page 18;

C. BHP Iron Ore Executive Committee report dated 10 June 2011, page 62;

D. BHP Iron Ore Executive Committee report dated 12 July 2011, page 65;

E. BHP Iron Ore Executive Committee report dated 12 September 2011, page 57.

ix. as to subparagraph (b), the Joint Applicants refer to particulars (vi)(A), (E)-(F), (H); (vii)(B); and viii(A) above;

x. as to subparagraph (c), the Joint Applicants refer to particulars (vi)(H)-(I); and viii(A) above.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (d) a prolonged shutdown of, or prolonged period of significantly reduced, production at the Germano Complex; and

Particulars

The risk of production at the Germano Complex being shut down or significantly reduced for a significant period of time arose by reason of, and/or was evidenced by, or are to be inferred from, inter alia:

- i. the fact that the ability to dispose of tailings into the Fundão Dam was essential to the continued operation of the Germano Complex, as to which the Joint Applicants refer to paragraphs 32, 38, 38A, 39A, 42(f) and 43(fa) above; and*
- ii. the likelihood of regulatory action by Brazilian authorities to suspend operations at the Germano Complex, potentially for a significant period of time, in the event of a failure of the Fundão Dam.*

The Joint Applicants further refer to the particulars (vi)(A), (D)-(F), (H)-(I); (vii)(D)-(E); and (viii)(A) to subparagraphs (a)-(c) above.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

- (e) Samarco falling short of its forecasts for production and revenues,

(the matters in subparagraphs (a)-(e) cumulatively, to the extent proven, the **General Consequential Risks**).

45. At all material times, it was likely that a prolonged interruption of operations at the Fundão Dam and/or a global dam failure would cause significant adverse consequences for BHP because:
- (a) Samarco would fall materially short of BHP's forecasts for Samarco contributions to BHP earnings;
 - (b) the value of BHP's investment in Samarco would be significantly impaired;
 - (c) (in the case of a dam collapse) Samarco and/or BHP would be exposed to liability:
 - (i) for substantial remediation costs;
 - (ii) to compensate affected persons for damage caused by a dam failure and/or to penalties for civil or criminal wrongs;
 - (d) BHP would be exposed to significant reputational damage,
- (the matters in subparagraphs (a)-(d) cumulatively, to the extent proven, **BHP Consequential Risks**).

H. CONTINUOUS DISCLOSURE CONTRAVENTIONS

H.1 Awareness of information and risks

46. At all material times from at least 2012 onwards, BHP's representatives on Samarco's board of directors and Samarco committees:
- (a) regularly attended meetings of Samarco's board of directors, "pre-board" meetings of ~~Samarco's shareholders~~ BHP's representatives on Samarco's board of directors held prior to meetings of Samarco's board of directors, and meetings of Samarco committees; and
 - (b) by reason of their position as members or alternate members of Samarco's board of directors and/or Samarco committees, read or ought to have read the papers and minutes of any meetings which they did not attend.

47. Between 2009 and 2015, matters the subject of and/or relating to:

- (aa) the Safety and Capacity Information;
- (a) the August 2012 Information;
- (b) the November 2012 Information;
- (c) the ~~Pre-27 August 2014~~ December 2013 Information;
- (ca) the July 2014 Information;
- (d) the ~~Post-August~~ November 2014 Information; ~~and~~
- (da) the April 2015 Information; and
- (e) the General Consequential Risks;

were discussed at and/or presented to:

- (ea) pre-board meetings of Samarco's board of directors;

Particulars

Discussions about the above matters took place in (at least) pre-board meetings held on 21 July 2009, 9 August 2011, 7 August 2012, 13 August 2013 and 18 September 2014.

~~*Further particulars may be provided after further discovery.*~~

- (f) meetings of Samarco's board of directors;

Particulars

Discussions about the above matters took place in (at least) board meetings held on 22 July 2009, 2 December 2009, 12 March 2010, 12 May 2010, 22 September 2010, 6 April 2011, 10 August 2011, 8 December 2011, 8 August 2012, 7 December 2012, 4 April 2013, 14 August 2013, 4 December 2013, 2 April 2014, 19 September 2014, 10 December 2014, 15 April 2015 and 5 August 2015.

~~*Further particulars may be provided after further discovery.*~~

- (g) closure meetings of the ITRB, and/or referred to in reports prepared by the ITRB;

Particulars

Discussions about the above matters took place in (at least) closure meetings of, or reports issued by, the ITRB in July 2009, on 7 August 2009, on 22 September 2009, in July 2010, in April 2011, in July 2011, in October 2011, in November 2011, in May 2012, on 19 October 2012, in April 2013, in September 2013, on 11 December 2013, on 14 November 2013, in January 2014, in February 2014, in July 2014, on 20 November 2014, and on 6 April 2015, and on 26 June 2015.

~~*Further particulars may be provided after further discovery.*~~

- (h) meetings of various Samarco committees, which reported to Samarco's board of directors, or to members of Samarco's executive board and/or committees which reported to Samarco's board of directors.

Particulars

Discussions about the above matters took place in, at least:

- i. meetings of the Samarco Operations Committee on 22 November 2011, 26 March 2012, 21 November 2012, 15 March 2013, 13 November 2013, 14 March 2014, 19 August 2014, 19 November 2014, 18 March 2015, and 10 July 2015;*
 - ii. meetings of the Samarco Performance Management Subcommittee ~~in~~ on 14 November 2012, on 27 February 2013, 9 July 2013, 30 September 2013, 24 October 2013, 31 January 2014, 15 May 2014, 13 June 2014, 7 August 2014, 21 October 2014, 10 February 2015, 13 March 2015, 12 May 2015, 19 June 2015, 10 September 2015 and 29 October 2015;*
 - iii. meetings of the PPE on 15 January 2015, 3 March 2015, 19 March 2015, 9 April 2015, 20 May 2015, and 13 August 2015;*
 - iv. meetings of the Samarco Capital Projects Subcommittee on 22 May 2015;*
- ~~*Further particulars may be provided after further discovery.*~~

47A. At all material times:

- (a) the Safety and Capacity Information;
- (b) the August 2012 Information;
- (c) the November 2012 Information;
- (d) the ~~Pre-27 August 2014~~ December 2013 Information;
- (da) the July 2014 Information;
- (e) the ~~Post-August~~ November 2014 Information;

(ea) the April 2015 Information;

(f) the General Consequential Risks; and/or

(g) any combination or subset thereof,

was information that:

(h) an employee of BHP Ltd (or any of its subsidiaries including BHP Brasil) who received the information in the performance of his or her role:

(i) as a representative of BHP on the Samarco board of directors or Samarco committees, at pre-board meetings, at board meetings, at Samarco committee meetings, at PPE meetings or at ITRB closure meetings;

(ii) requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco; and/or

(iii) undertaking an audit or review of Samarco;

was under a duty to convey to a relevant officer of BHP Ltd; and/or

(i) reasonable information systems or management procedures ought to have brought to the attention of a relevant officer of BHP Ltd.

Particulars

The Joint Applicants refer to the matters in paragraphs 11 to 17 and 25 to 30G above.

48. BHP Ltd was aware (within the meaning of ASX Listing Rule 19.12):

(aa) of the Safety and Capacity Information:

(i) by around 8 August 2012;

(ii) alternatively, by no later than in the period 8 August 2012 and 5 November 2015 (Brazilian time);

(a) of the August 2012 Information:

- (i) by around 8 August 2012;
 - (ii) alternatively, by ~~no later than in the period 8 August 2012 and 30 November 2012~~ around 19 October 2012;
- (b) of the November 2012 Information:
- (i) by ~~no later than~~ around 30 November 2012;
 - (ii) alternatively, by ~~no later than in the period 30 November 2012 and 27 August 2014~~ around 15 February 2013;
- (c) ~~by no later than in the period from 30 November 2012 until around 27 August 2014, of the Pre-27 August 2014 Information~~ of the December 2013 Information:
- (i) by around 31 December 2013;
 - (ii) alternatively, by around 5 February 2014;
- (ca) of the July 2014 Information:
- (i) in subparagraph 42A(b) above, by around 5 February 2014, alternatively by around 31 July 2014;
 - (ii) in the balance of paragraph 42A, by around 31 July 2014;
- (d) ~~by no later than in the period from around 27 August 2014 until 5 November 2015 (Brazilian time), of the Post-August 2014 Information~~ of the November 2014 Information:
- (i) by around 20 November 2014;
 - (ii) alternatively, by around 27 November 2014;
- (da) of the April 2015 Information:
- (i) by around 6 April 2015;
 - (ii) alternatively, by around 18 May 2015;
 - (iii) alternatively, prior to 5 November 2015 (Brazilian time);

- (e) at all material times, of:
- (i) the General Consequential Risks; and
 - (ii) the BHP Consequential Risks,

(Risks).

Particulars

One or more executive officers (prior to 30 April 2013, within the meaning of Listing Rule 19.12 at that time) or officers (from 1 May 2013, within the meaning of Listing Rule 19.12 at that time) of BHP had, or ought reasonably to have, come into possession of each of the above items of information in the course of the performance of their duties as a director or executive officer of BHP, by reason of:

- i. the matters set out in paragraphs 11-17, 25-30G, and 46-47A above;*
- ii. the fact that the ITRB advised on technical matters relating inter alia to tailings disposal and the development of the Fundão Dam; the ITRB was a critical control for BHP of the risk of failure of Samarco's tailings storage facilities, including the Fundão Dam; and Fernandes had requested that Samarco inform BHP of ITRB findings in a timely way (BHP-000186938);*
- iiia. the fact that a catastrophic failure of the Fundão Dam had the potential to cause the consequences set out in paragraph 44;*
- iii. the fact that the Fundão Dam was of critical importance to the operation of the Germano Complex, particularly given that the dam was required to store increased tailings waste as a result of the Third Pellet Plant Project and P4P Project and the matters pleaded in paragraph 39A above;*
- iiia. the fact that a prolonged interruption of the operations of the Fundão Dam and/or global dam failure had the potential to cause the consequences set out in paragraph 45;*
- iv. the extent of BHP's investment in Samarco, and the importance of BHP's interest in Samarco to BHP, as to which the Joint Applicants refer to paragraphs 21-22 above;*
- v. BHP announcing the P4P Project, involving significant cost, such that BHP was or ought to have been aware that the P4P Project would lead to an increase in tailings being deposited in the Fundão Dam;*
- vi. BHP having made representations concerning its commitment to safety and environmental sustainability, as to which the Joint Applicants refer to and repeat paragraphs 53A-59 below;*
- vii. Wilson stating that BHP's board of directors had identified the risk of the collapse of the Fundão Dam, prior to the dam's actual collapse, as reported in an article in the Australian Financial Review dated 1 November 2017;*
- viii. on or about 21 October 2013, at the request of the Public Ministry for the*

State of Minas Gerais, the Pristino Institute issued a report raising various concerns about the Fundão Dam. BHP read that report at or about the time of its publication, as to which the Joint Applicants refer to a statement to that effect made by Jac Nasser (Nasser), then Chairman of BHP, at BHP's annual general meeting held on 19 November 2015;

- viii. the risk of tailings dam failures was generally identified as a focus area or key risk by BHP, and the risk of the failure of Samarco tailings dams and the Fundão dam in particular was a matter reported to the BHP GMC, the Iron Ore RAC and BHP's audit functions, including in:*
 - a. papers for the meeting of the BHP GMC dated 22 May 2012, page 54;*
 - b. memorandum to BHP Business CEOs titled 'Significant Dams Risk Review' dated 12 September 2012;*
 - c. presentation titled 'Risk Snapshot Samarco Operations' dated November 2012;*
 - d. Iron Ore RAC Risk Management Report dated January 2013;*
 - e. papers for the meeting of the BHP GMC dated 9 April 2013.*
- ix. by reason of the matters referred to in these particulars, it may be inferred that BHP representatives on Samarco's board of directors and Samarco committees reported to the BHP GMC and/or a relevant company officer on matters the subject of or relating to the information referred to in paragraphs 48(aa)-(e) above;*
- x. by reason of the matters referred to in these particulars, it may be inferred that employees of BHP (and its subsidiaries including BHP Brasil) requesting and/or receiving information for BHP's supervision or monitoring of Samarco and/or auditing or reviewing Samarco reported to the BHP GMC and/or a relevant company officer on matters the subject of or relating to the information referred to in paragraphs 48(aa)-(e) above;*
- xi. by reason of the matters referred to in these particulars, it may be inferred that the Samarco executive board and/or management reported to BHP representatives on Samarco's board of directors and Samarco committees and/or employees BHP (and its subsidiaries including BHP Brasil) on matters the subject of or relating to the information referred to in paragraphs 48(aa)-(e) above;*

Safety and Capacity Information:

- xii. further, BHP's awareness of the Safety and Capacity Information in paragraph 38B is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred to in the particulars subjoined to paragraph 38B, being:*
 - a. report of visit to Fundão Dam by Ferreira and Jacques dated 17 April 2009 in the performance of their roles as employees of BHP recording information about Samarco for BHP's supervision and/or monitoring of Samarco, forwarded to Ashby on 19 May 2009 (BHP00026258);*

- b. *the May 2009 Robertson Report received by Bentel on 28 May 2009 (BHP00212194) and received by Nogueira, Ferreira and da Fonseca on 19 June 2009 (BHP00212213, BHP00116028, BHP00026496) in the performance of their roles as representatives of BHP on the Samarco board of directors and/or Samarco committees and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
 - c. *the BHP presentation to the Samarco pre-board meeting dated 21 July 2009, which it is inferred was attended by officers and/or employees of BHP, who are presently not known to the Joint Applicants, in the performance of their roles as representatives of BHP at Samarco pre-board meetings;*
 - d. *presentation to the Samarco board of directors on 4 December 2012 and minutes of the meeting on 7 December 2012 attended by Wilson, Zweig, Fernandes and Lynch in the performance of their roles as representatives of BHP on the Samarco board and/or committees;*
 - e. *ITRB Report No. 3 (Rev. 1) received by Ferreira (BHP00130107) and Fernandes (BHP00057415) on 15 February 2013 and ITRB Report No. 4 received by Arnold, Corless and Fernandes on 17 October 2012 (BHP00015344) in the performance of their roles as representatives of BHP on Samarco committees and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
 - f. *the Operations Manuals received by Max Wetzig (**Wetzig**) on or around 12 July 2013 (BHP00061738), in the performance of his role as a member of the RAA team auditing Samarco for BHP;*
- xiii. *further, BHP's awareness of the Safety and Capacity Information in paragraph 39 is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred to in the particulars subjoined to subparagraphs 39(a) to (g), being:*
 - a. *the documents referred to in particular xii(f) above;*
 - b. *the December 2008 Robertson Report received by Bentel on 28 May 2009 (BHP00212191) and Ferreira on 7 July 2009 (BHP00220690) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
 - c. *BHP Presentation titled 'Risk Snapshot Samarco Operations' dated November 2012 sent by Arnold to Corless on 19 October 2012 (BHP00054088), and sent to Wilson, Fernandes and Zweig on 5 November 2012 (BHP-000211224);*
 - d. *ITRB Report No. 11 received by Ferreira and Fernandes on 27 November 2014 (BHP00140093) in the performance of their roles as representatives of BHP on Samarco committees and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- xiv. *further, BHP's awareness of the Safety and Capacity Information in subparagraphs 39(a), (ca), (e)-(g) is to be inferred, at all material times, from:*

- a. *the fact that the Fundão Dam was to be constructed using the upstream method and the matters referred to in paragraph 37 above;*
 - b. *the fact that BHP at all material times was one of the world's largest mining companies and had mining operations, or held interests in mining operations, with facilities which included numerous tailings dams;*
- xv. *further, BHP's awareness of the Safety and Capacity Information in paragraph 39A is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred to in the particulars subjoined to paragraph 39A, being:*
 - a. *the documents referred to in particular xii(f) above;*
 - b. *the BHP Presentation to the Samarco pre-board Meeting on 9 August 2011, which meeting was attended by Ashby, Randolph, Campbell and Raman (BHP00213283);*
 - c. *the presentation to the Samarco pre-board meeting on 7 August 2012, which was attended by Wilson, Randolph, Zweig, Raman, and Fernandes in the performance of their roles as representatives of BHP at Samarco pre-board meetings;*
 - d. *the presentation to the Samarco pre-board meeting on 18 September 2014, which it is inferred was attended by officers and/or employees of BHP, who are presently not known to the Joint Applicants, in the performance of their roles as representatives of BHP at Samarco pre-board meetings;*
 - e. *report of the Samarco board of directors meeting dated 5 August 2015, which meeting was attended by Wilson, Ottaviano, Fernandes and Beck;*

August 2012 Information:

- xvi. *further, BHP's awareness of the August 2012 Information is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred in the particulars subjoined to subparagraphs 40(a) to (ja), being:*
 - a. *the documents referred to in particulars xii(a)-(f) and xiii(b)-(c) above;*
 - b. *the report of the Samarco board of directors meeting on 2 December 2009 attended by Ashby, Slaven, Randolph and Nogueira in the performance of their roles as representatives of BHP on the Samarco board;*
 - c. *the 20 November 2010 Robertson Report, the key findings of which were presented on 19 November 2010 to Samarco directors the identities of whom are presently not known to the Joint Applicants but it is inferred included one or more BHP personnel and/or officers in the performance of their roles as representatives of BHP on the Samarco board;*
 - d. *ITRB Report No. 1, ITRB Report No. 3 (Rev 1), and ITRB Report No. 5 received by Ferreira and Fernandes on 15 February 2013 (BHP00130107, BHP00057415) in the performance of their roles as representatives of BHP on Samarco committees and/or employees*

of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;

- e. the ITRB Report No. 2, received by Wetzig on or around 12 July 2013, in the performance of his role as a member of the RAA team auditing Samarco for BHP (BHP00061738);*
- f. the email from Gavin Wilby to McIlroy dated 12 May 2011 attaching minutes of a meeting regarding the inspection of gallery incidents (BHP00121508, BHP00121510), received by her in the performance of her role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- g. ITRB Report No. 6, received by Ferreira on 4 June 2013 (BHP00060524), and the attendance of the ITRB closure meeting on 26 April 2013 by Ferreira, in the performance of his role as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- h. the email from Bentel to Watson and Slaven dated 26 May 2009 (BHP00026258) sent and received in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- i. the FY14 Technical Audit Report dated September 2013 prepared by the RAA;*
- j. papers presented to the Iron Ore RAC meeting on 6 February 2014 (BHP00002874) attended by Wilson and Beck;*
- k. the April 2011 Robertson Report which was in the possession of McIlroy and Nick Allen (BHP, Vice President Compliance) by no later than 30 June 2011 (BHP00213173) and Corless and Arnold by no later than 11 May 2012 (BHP00213629), in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- l. the report of the Samarco board of directors meeting on 12 May 2010 attended by Slaven, Nogueira, and Randolph in the performance of their roles as representatives of BHP on the Samarco board;*
- m. the email chain between Matthew Gillespie (Financial Controller, BHP Iron Ore), Nogueira and da Fonseca between 23 and 29 March 2012 with the subject 'Vale use of Samarco Tailings Dam' (BHP-000222914), and attached BHP powerpoint presentation titled "Contract for the Disposal of Vale slime in Samarco's tailings dam", received by Matthew Gillespie on behalf of Randolph in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- n. Samarco presentation titled, 'BHP Billiton visit – Samarco risk management – risk of rupture of dams' dated 16 May 2012 as presented during a visit to Samarco's dams attended by Corless and Arnold (BHP00048699) as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*

- o. presentation to the Samarco Performance Management Subcommittee on 14 November 2012 attended by Ferreira in the performance of his role as a representative of BHP on Samarco committees;
 - p. email to Arnold, Corless and Fernandes titled 'BHP President Presentation' dated 22 October 2012 (BHP00054271) sent and received in the performance of roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - q. the minutes of the Samarco board of directors meeting on 8 August 2012, attended by Randolph, Campbell, Ashby and Nogueira as representatives of BHP on the Samarco board;
 - r. document titled 'BHP Billiton Interview May2012 Rev01' dated 4 June 2012 received by Ferreira, da Fonseca and Bentel on 4 June 2012 (BHP00213658) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- xvii. further, BHP's awareness of the August 2012 Information in paragraph 40(k) is to be inferred from its awareness of the matters in paragraphs 39, 39A and 40(a)-(j*a*) (or such of those matters as BHP is found to be aware);

November 2012 Information:

- xviii. further, as to BHP's awareness of the November 2012 Information in paragraph 41(a), the Joint Applicants refer to the particulars of awareness of the August 2012 Information above;
- xix. further, BHP's awareness of the November 2012 Information is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred to in the particulars subjoined to subparagraphs 41(aa) to (d*b*), being:
 - a. documents referred to in particulars xii(f), and xvi(d), ~~and~~ (g) and (o) above;
 - b. Samarco FMEA dated 30 August 2012 received by Ferreira on 18 November 2013 (BHP00234838) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- xx. further, BHP's awareness of the November 2012 Information in paragraph 41(e) is to be inferred from its awareness of the matters in paragraphs 39, 39A and 41(a)-(d*b*) (or such of those matters as BHP is found to be aware);

~~Pre-27 August 2014~~ December 2013 Information:

- xxi. further, as to BHP's awareness of the ~~Pre-27 August 2014~~ December 2013 Information in paragraph 42(aa), the Joint Applicants refer to the particulars of awareness of the August 2012 Information and the November 2012 Information above;
- xxii. further, BHP's awareness of the ~~Pre-27 August 2014~~ December 2013 Information is to be inferred at least from the date of receipt of the

documents, or the date of the documents, referred to in the particulars subjoined to subparagraphs 42(a) to (m), being:

- a. documents referred to in particulars xii(d), xiii(c)-(d), and xvi(d), (g) and (i), (n) and (o) above;
- aa. presentation to the Samarco Performance Management Subcommittee dated 30 September 2013 received by Fernandes and Cardoso on 26 December 2012 (BHP00056219) in the performance of their roles as representatives of BHP on the Performance Management Subcommittee and/or as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- ab. Samarco GGB Monitoring of Waste Disposal Planning Meeting Report dated 8 July 2013, which came into the possession of Wetzig (BHP00016515) on or around at least 12 July 2013;
- ac. presentation to the Samarco Performance Management Subcommittee meeting on 9 July 2013 attended by Fernandes, Ferreira and Cardoso in the performance of their roles as representatives of BHP at Performance Management Subcommittee meetings;
- ad. presentation to the Samarco Performance Management Subcommittee dated 24 October 2013 received by Fernandes, Cardoso and Ferreira on 23 October 2013 (BHP00234609) in the performance of their roles as representatives of BHP on the Performance Management Subcommittee and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- ae. presentation to the Samarco Operations Committee meeting on 13 November 2013 attended by Fernandes in the performance of his role as a representative of BHP at Operations Committee meetings;
- b. ITRB Report No. 7 received by received by Ferreira on 13 November 2013 (BHP00251455) and Fernandes on 26 November 2013 (BHP00017173) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- ba. Samarco presentation titled 'Management of Dam Geotechnics, BHP Billiton, Monitoring and Inspection' received by Ferreira on 5 December 2013 (BHP00215043) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- bb. presentation to the BHP Iron Ore Executive Committee dated 9 January 2014 received by Jacques and Ferreira on 9 January 2014 (BHP00070354) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- bc. presentation to the Samarco Performance Management

Subcommittee meeting on 31 January 2014 received by Fernandes, Ferreira and Cardoso on 17 January 2014 (BHP00070660) in the performance of their roles as representatives of BHP on the Performance Management Subcommittee and/or in their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;

- bd. minutes of the meeting of the Samarco Performance Management Subcommittee on 31 January 2014 attended by Fernandes, Ferreira, and Cardoso in the performance of their roles as representatives of BHP at Performance Management Subcommittee meetings;
- be. presentation to the Samarco board of directors meeting on 2 April 2014 attended by Wilson, Zweig, Fernandes and Beck in the performance of their roles as representatives of BHP on Samarco board of directors and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- bf. presentation to the Samarco Performance Management Subcommittee meeting on 15 May 2014 attended by Fernandes, Ferreira and Cardoso in the performance of their roles as representatives of BHP at Performance Management Subcommittee meetings;
- bg. presentation to the Samarco Performance Management Subcommittee meeting on 13 June 2014 attended by Fernandes, Ferreira and Cardoso in the performance of their roles as representatives of BHP at Performance Management Subcommittee meetings;
- bh. presentation to the Samarco Performance Management Subcommittee meeting on 7 August 2014 attended by Fernandes in the performance of his role as a representative of BHP at Performance Management Subcommittee meetings;
- bi. presentation to the Samarco Performance Management Subcommittee meeting on 21 October 2014 attended by Fernandes and Ferreira in the performance of their roles as representatives of BHP at Performance Management Subcommittee meetings;
- bj. presentation to Samarco's Operations Committee meeting on 19 November 2014 attended by Fernandes in the performance of his role as a representative of BHP on Samarco committees;
- bk. Samarco GGB Monitoring of Waste Disposal Planning Meeting Report dated 9 December 2014, which came into the possession of Fernandes (BHP00019846) on or around at least 12 December 2014;
- bl. Samarco GGB Monitoring of Waste Disposal Planning Meeting Report dated 14 January 2015, which came into the possession of Fernandes (BHP00019949) on or around at least 20 January 2015;
- bm. presentation to the Samarco Performance Management Subcommittee meeting on 10 February 2015 attended by Fernandes, Ferreira and Cardoso in the performance of their roles as representatives of BHP at Performance Management

Subcommittee meetings:

- bn. presentation to the Samarco Operations Committee meeting on 10 July 2015 attended by Fernandes, Ferreira and Cardoso in the performance of their roles as representatives of BHP at Operations Committee meetings;
- bo. presentation to the Samarco Performance Management Subcommittee meeting on 10 September 2015, attended by Fernandes, Ferreira, Pereira and Cardoso in the performance of their roles as representatives of BHP at Performance Management Subcommittee meetings;
- bp. minutes of the Samarco Performance Management Subcommittee meeting on 10 September 2015, attended by Fernandes, Ferreira, Pereira and Cardoso in the performance of their roles as representatives of BHP at Performance Management Subcommittee meetings;
- c. ITRB Report No. 8 received by Jacques and Ferreira on 30 June 2015 (BHP00098396) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- d. ~~[Deleted.] ITRB Report No. 10 received by Ferreira on 14 November 2014 (BHP00215628) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;~~
- e. the emails between Fernandes and Ferreira on 27 and 28 January 2015 (BHP00261051, BHP00252966), in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- f. papers presented to the meeting of the Samarco Performance Management Subcommittee on or around 27 February 2013 sent by Cardoso and received by Ferreira and Fernandes on 27 February 2013 (BHP00130280) in the performance of their roles as representatives of BHP on Samarco board of directors and committees and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- g. Samarco 5 year plan dated July 2013 sent by Ferreira to Jacques on 16 July 2013 (BHP00062001) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- h. BHP presentation to the Samarco pre-board meeting on 13 August 2013 titled "Samarco 5-Year Plan", which it is inferred was attended by officers and/or employees of BHP, who are presently not known to the Joint Applicants, in the performance of their roles as representatives of BHP at Samarco pre-board meetings;
- i. presentation to the Samarco board of directors meeting on 4 December 2013 attended by Wilson, Zweig, Lynch and Fernandes in the performance of their roles as representatives of BHP on the

Samarco board of directors and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;

- j. ITRB Report No. 9 received by Ferreira on 14 November 2014 (BHP00215628) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- k. report of the Samarco board of directors meeting on 2 April 2014, attended by Wilson, Randolph, Raman and Zweig in the performance of their roles as representatives of BHP on the Samarco board of directors and/or employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- l. ~~[Deleted.] presentation to the meeting of the Samarco board of directors on 4 April 2013 attended by Wilson, Zweig and Fernandes in the performance of their roles as representatives of BHP on the Samarco board;~~*
- m. Group RAA Detailed Test Work Papers 4100-1900 to 4410-1909 prepared by Wetzig in the performance of his role as a member of the RAA team auditing Samarco for BHP;*
- n. presentation to the Operations Committee meeting on 19 August 2014, attended by Fernandes in the performance of his role as a representative of BHP at Operations Committee meetings which it is inferred was attended by officers and/or employees of BHP, who are presently not known to the Joint Applicants, in the performance of their roles as representatives of BHP at Samarco pre-board meetings; and which was received by Ferreira from Fernandes on 22 August 2014 (BHP-000208850), in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- o. email from Ferreira to Jacques dated 22 August 2014 (BHP00080732) sent and received in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- p. ~~[Deleted.] Samarco FMEA dated 16 July 2014 received by Ferreira and Fernandes on 27 November 2014 (BHP00260989) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;~~*
- q. report of the meeting of the Samarco board of directors on 14 August 2013 which was attended by Wilson and Zweig in the performance of their roles as representatives of BHP on the Samarco board, and Raman in the performance of her role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;*
- r. email chain between Corless and Fernandes dated 6 November 2014 (BHP-000105441) in the performance of their roles as employees of BHP requesting and/or receiving information about*

Samarco for BHP's supervision and/or monitoring of Samarco;

- s. Samarco FMEA dated 21 May 2013 received by Ferreira on 18 November 2013 (BHP00234838) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- t. Samarco FMEA dated 27 November 2013 received by Cardoso on 4 February 2014 (BHP00071321) and Ferreira and Fernandes on 6 March 2014 (BHP00076338) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- xxiii. *further, BHP's awareness of the ~~Pre-27 August 2014~~ December 2013 Information in paragraph 42(n) is to be inferred from its awareness of the matters in paragraphs 39, 39A, 42(aa)-(m) (or such of those matters as BHP is found to have been aware);*

July 2014 Information:

- xxiiia. further, as to BHP's awareness of the July 2014 Information in paragraph 42A(a), the Joint Applicants refer to the particulars of awareness of the August 2012 Information, the November 2012 Information and the December 2013 Information above;
- xxiiib. further, BHP's awareness of the July 2014 Information is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred to in the particulars subjoined to subparagraphs 42A(b) to (g), being:
 - a. documents referred to in particulars xiii(d) and xxii(bc)-(bd), (c) and (n);
 - b. ITRB Report No. 10 received by Ferreira on 14 November 2014 (BHP00215628) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - c. presentation to the meeting of the Samarco board of directors on 4 April 2013 attended by Wilson, Zweig and Fernandes in the performance of their roles as representatives of BHP on the Samarco board;
 - d. Samarco FMEA dated 16 July 2014 received by Ferreira and Fernandes on 27 November 2014 (BHP00260989) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- xxiiic. further, BHP's awareness of the July 2014 Information in paragraph 42A(h) is to be inferred from its awareness of the matters in paragraphs 39, 39A and 42A(a)-(g) (or such of those matters as BHP is found to be aware);

Post-August November 2014 Information:

- xxiv. *further, as to BHP's awareness of the ~~Post-August~~ November 2014 Information in paragraph 43(a), the Joint Applicants refer to the particulars of awareness of the August 2012 Information, the November*

2012 Information, and the ~~Pre-27 August~~ December 2013 Information and the July 2014 Information above;

- xxv. further, BHP's awareness of the ~~Post-August~~ November 2014 Information is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred in the particulars subjoined to subparagraphs 43(b) to (fc), being:
- a. documents referred to in particulars xiii(d) and xxii(bc)-(bd), and (bi) above;
 - b. ~~[Deleted.] ITRB Report No. 12, received by Ferreira by no later than 18 May 2015 (BHP00096333, BHP-000207889) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;~~
 - c. Project 940 Project Execution Plan dated 25 February 2015, received by Ferreira and Fernandes by at least 31 March 2015 (BHP-000017323) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - d. ~~presentation to Samarco's Operations Committee meeting on 19 November 2014 attended by Fernandes in the performance of his role as a representative of BHP on Samarco committees;~~
 - e. ~~[Deleted.] the presentation to Samarco's Operations Committee meeting on 10 July 2015 received by Fernandes, Ferreira and Cardoso on 10 July 2015 (BHP00099488) in the performance of their roles as representatives of BHP on Samarco committees;~~
- xxvi. further, BHP's awareness of the ~~Post-August~~ November 2014 Information in paragraph 43(g) is to be inferred from its awareness of the matters in paragraphs 39, 39A, 43(a)-(fc) (or such of those matters as BHP is found to have been aware);

April 2015 Information

- xxvii. further, as to BHP's awareness of the April 2015 Information in paragraph 43A(a), the Joint Applicants refer to the particulars of awareness of the August 2012 Information, the November 2012 Information, the December 2013 Information, the July 2014 Information and the November 2014 above;
- xxviii. further, BHP's awareness of the April 2015 Information is to be inferred at least from the date of receipt of the documents, or the date of the documents, referred to in the particulars subjoined to subparagraphs 43A(a) to (g), being:
- aa. documents referred to in particulars xxii(e) and (bn), and xxv(c) above;
 - a. ITRB Report No. 12, received by Ferreira by no later than 18 May 2015 (BHP00096333, BHP-000207889) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - b. the presentation to the Samarco Performance Management

Subcommittee meeting on 13 March 2015 attended by Fernandes, Ferreira and Cardoso in the performance of their roles as representatives of BHP on Samarco committees;

- xxix. further, BHP's awareness of the April 2015 Information in paragraph 43A(h) is to be inferred from its awareness of the matters in paragraphs 39, 39A and 43A(a)-(g) (or such of those matters as BHP is found to be aware);

General Consequential Risks

- xxx. further, BHP's awareness of the General Consequential Risks in paragraph 44 is to be inferred at least from the date of receipt of the document, or the date of the document, referred to in the particulars subjoined to subparagraphs 44(a)-(c), being:
- a. documents referred to in particular xiii(c) above;
 - b. Samarco Bow-Tie Risk Assessment dated 1 June 2010, received by Carlos Villalobos (BHP, Group Manager HSEC Audit) and Fabio Furtado (BHP Iron Ore, Accounting Manager) on 2 May 2011 (BHP00039962) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - c. BHP Iron Ore Strategy & Development FY12 5 Year Plan dated 17 February 2011 received by Ottaviano, Raman, Campbell on 22 February 2011 (BHP00038259);
 - d. BHP Iron Ore Executive Committee report dated 10 June 2011 received by Ferreira, Cardoso and Nogueira on 10 June 2011 (BHP00040522) in the performance of their roles as employees of BHP receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - e. BHP Iron Ore Executive Committee report dated 12 July 2011 received by Nogueira, Ferreira, Raman, Campbell and Cardoso on 12 July 2011 (BHP00122125) in the performance of their roles as employees of BHP receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - f. BHP Iron Ore Executive Committee report dated 12 September 2011 received by Nogueira, Ferreira, Raman, Campbell and Cardoso on 14 September 2011 (BHP00042657) in the performance of their roles as employees of BHP receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - g. BHP Iron Ore Executive Committee report dated October 2011, received by Ferreira, Cardoso and Nogueira on 16 October 2011 (BHP00122710) in the performance of their roles as employees of BHP receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
 - h. BHP Iron Ore Business Group Risk and Audit Committee report dated 27 January 2012, received by Corless on 19 January 2012 (BHP00045644) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;

- i. presentation to the BHP Iron Ore Executive Committee dated 15 March 2012 and presented to the BHP Iron Ore Executive Committee on 12 March 2012 attended by Ashby, Raman, Ottaviano and Zweig (BHP-000112127) in the performance of their roles as employees of BHP receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- j. BHP Bow-Tie Risk Assessment dated 25 April 2012, received by Zweig and Arnold on 17 January 2013 (BHP-000216050) as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- k. papers for the meeting of the BHP GMC on 22 May 2012 attended by Randolph (BHP00125152);
- l. BHP HSEC Risk Profile Report to the BHP Sustainability Committee dated June 2012 received by Randolph on 31 May 2012 (BHP00048834);
- m. presentation to the BHP Iron Ore Executive Committee dated 11 June 2012 and presented to the BHP Iron Ore Executive Committee on 20 June 2012 attended by Wilson, Ottaviano and Zweig (BHP00049351);
- n. BHP BRAC Risk Management Report dated June 2012 sent by Cardoso and received by Fernandes and Ferreira on 12 August 2012 (BHP-000286097) as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- o. BHP Iron Ore RAC Risk Management Report presented to the meeting of the BHP Ferrous and Coal Group RAC meeting on 13 August 2012 attended by Randolph, Wilson and Raman (BHP00001944);
- p. BHP Samarco Operations Risk Profile presentation dated August 2012, sent by Arnold and received by Zweig, Fernandes and Corless on 24 August 2012 (BHP00213795) as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- q. papers for the meeting of the BHP GMC on 2 October 2012 attended by Randolph (BHP00005549);
- r. papers for the BHP Iron Ore FY13 Directional Appraisal meeting on 22 November 2012 attended by Wilson, Zweig, and Ottaviano (BHP00055267);
- s. BHP Bow-Tie Risk Assessment dated 25 February 2013, received by Natie Victor on 17 July 2013 (BHP00062020) in the performance of his role as an employee of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring of Samarco;
- t. BHP Brazil Risk Register dated 22 July 2013, received by Corless and Victor on 22 July 2013 (BHP00062239) in the performance of their roles as employees of BHP requesting and/or receiving information about Samarco for BHP's supervision and/or monitoring

of Samarco:

Constructive awareness

xxxi. further or in the alternative, by reason of the matters referred to in these particulars, it was the case that (or it may be inferred that) one or more executive officers (prior to 30 April 2013, within the meaning of Listing Rule 19.12 at that time) or officers (from 1 May 2013, within the meaning of Listing Rule 19.12 at that time) of BHP, or an employee of BHP under a duty inform such officer(s), was in possession of information from which they ought to have formed an opinion or drawn an inference consistent with the above items of information in paragraph 48(a) to (g), including:

- a. one or more of the matters in paragraph 40(k) above;
- b. one or more of the matters in paragraph 41(e) above;
- c. one or more of the matters in paragraph 42(n) above;
- d. one or more of the matters in paragraph 42A(h) above;
- e. one or more of the matters in paragraph 43(g) above;
- f. one or more of the matters in paragraph 43A(h) above;
- g. one or more of the matters in paragraph 44 above;
- h. one or more of the matters in paragraph 45 above

~~Further particulars may be provided following further discovery.~~

49. By reason of the matters set out in the preceding paragraph, BHP Ltd was aware, for the purposes of Rule 3.1 of the ASX Listing Rules, and was aware, for the purposes of s 674(2) of the Corporations Act, of the respective information and risks set out in paragraphs 48(aa)-(e) above, at the respective times set out therein.

H.2 Failure to make continuous disclosure

50. Each of the:

- (aa) Safety and Capacity Information;
- (a) August 2012 Information;
- (b) November 2012 Information;
- (c) ~~Pre-27 August 2014~~ December 2013 Information;
- (ca) July 2014 Information;
- (d) Post-August November 2014 Information;
- (da) April 2015 Information;

(e) Risks,

or alternatively, any combination or subset thereof, constituted information that:

- (f) a reasonable person would expect to have a material effect on the price or value of BHP Ltd Shares; and
- (g) was not generally available, within the meaning of s 676 of the Corporations Act, during the Relevant Period.

Particulars

As to subparagraph (f):

- i. the items of information referred to in each of the subparagraphs (aa) to (e) to the extent BHP is found to have been aware of that information, alternatively any combination or subset thereof, constituted information that would, or would be likely to, influence persons who commonly invest in securities in deciding whether to acquire or dispose of the BHP Ltd Shares;
- ii. further or in the alternative, to the extent BHP is not found to have been aware of:
 - a. one or more of the matters in paragraph 40(k) above;
 - b. one or more of the matters in paragraph 41(e) above;
 - c. one or more of the matters in paragraph 42(n) above;
 - d. one or more of the matters in paragraph 42A(h) above;
 - e. one or more of the matters in paragraph 43(q) above;
 - f. one or more of the matters in paragraph 43A(h) above;
 - g. one or more of the matters in paragraph 44 above;
 - h. one or more of the matters in paragraph 45 above.

if the items of information referred to in each of the subparagraphs (aa) to (e) of which BHP is found to have been aware, alternatively any combination or subset thereof, was disclosed to the ASX:

 - i. persons who commonly invest in securities would have, based on the disclosed information, formed an opinion or drawn an inference, or obtained or received the opinion formed by or inference drawn by another person, consistent with one or more of the matters in particulars (ii)(a) to (h) above; and
 - j. the disclosed information thereby would, or would be likely to, influence persons who commonly invest in securities in deciding whether to acquire or dispose of the BHP Ltd Shares.

51. By reason of the matters set out in paragraphs 7 and 48-50 above, BHP Ltd was obliged by Rule 3.1 of the ASX Listing Rules and s 674(2) of the Corporations Act to immediately inform the ASX of the following information (to the extent proven that BHP Ltd was aware of that information as pleaded in paragraph 48 above):
- (a) the August 2012 Information, the Safety and Capacity Information, and the Risks (alternatively, any combination or subset thereof), by around 8 August 2012, alternatively by around 19 October 2012;
 - (b) the November 2012 Information, the Safety and Capacity Information, and the Risks (alternatively, any combination or subset thereof), by ~~no later than~~ around 30 November 2012, alternatively by around 15 February 2013;
 - (c) the ~~Pre-27 August 2014~~ December 2013 Information, the Safety and Capacity Information, and the Risks (alternatively, any combination or subset thereof), by ~~no later than 27 August 2014~~ around 31 December 2013, alternatively by around 5 February 2014;
 - (ca) the July 2014 Information:
 - (i) in subparagraph 42A(b) above, the Safety and Capacity Information, and the Risks (alternatively, any combination or subset thereof), by around 5 February 2014, alternatively by around 31 July 2014;
 - (ii) in the balance of paragraph 42A, the Safety and Capacity Information, and the Risks (alternatively, any combination or subset thereof), by around 31 July 2014;
 - (d) the ~~Post-August~~ November 2014 Information, the Safety and Capacity Information, and the Risks (alternatively, any combination or subset thereof), ~~at all material times between 27 August 2014 and 9 November 2015~~ by around 20 November 2014, alternatively by around 27 November 2014;
 - (da) the April 2015 Information, the Safety and Capacity Information, and the Risks (alternatively, any combination or subset thereof), by around 6 April 2015, alternatively, by around 18 May 2015, alternatively prior to 5 November 2015 (Brazilian time).
52. In respect of each of the disclosures referred to in the preceding paragraph which were required to be made (**Required Disclosures**), BHP Ltd did not inform the ASX at any time prior to 9 November 2015, and thereby contravened ASX Listing Rule 3.1.

53. In the premises of the preceding paragraph, in respect of each of the Required Disclosures, BHP Ltd contravened s 674(2) of the Corporations Act (**Continuous Disclosure Contraventions**).

I. MISLEADING OR DECEPTIVE CONDUCT

I.1 BHP Ltd's Statements prior to 9 November 2015

- 53A. During the Relevant Period, BHP Ltd published or caused to be published and/or made available to the ASX the BHP Billiton Charter (**Charter**) which:

- (a) it described as:
 - (i) the single most important means by which BHP communicated who it was, what it did, and what it stood for as an organisation; and
 - (ii) the basis for BHP's decision-making; and
- (b) stated, under "Our Values", as its first value:

"Sustainability

Putting health and safety first, being environmentally responsible and supporting our communities."

Particulars

The Charter was published, and described, in the form pleaded at paragraph 53A above during the Relevant Period on the website <www.bhpbilliton.com>.

The Charter was also reproduced in full, including with the Sustainability value pleaded at paragraph 53A(b) above, in inter alia:

- i. the FY2012 annual report, inside cover page;*
- ii. the FY2012 Summary Review, page 2;*
- iii. the FY2013 annual report, inside cover page;*
- iv. the FY2013 Summary Review, page 2;*
- v. the FY2013 Sustainability Report, page 2;*
- vi. the FY2014 annual report, inside cover page;*
- vii. the FY2014 Summary Review, page 2;*
- viii. the FY2014 Sustainability Report, page 2;*
- ix. the FY2015 annual report, inside cover page;*
- x. the FY2015 Sustainability Report, page 2.*

In the 2011 Annual General Meeting presentation, the CEO of BHP said: "As I said earlier, the foundation for everything we do at BHP Billiton is Our Charter, which sets our values. We fundamentally believe that our overall long-term success depends on our ability to manage our operations in a safe and sustainable manner.": page 5.

In the 2012 Preliminary Full Year Results Analyst and Investor Briefing, the CEO of BHP said: "...let me start off by talking about sustainability, one of our core values. Our Charter is at the heart of everything we do. It clearly emphasises the importance of putting health and safety first, the need to be environmentally responsible and the role we play in supporting communities.": page 2.

The FY2012 Summary Review stated that the Charter set out BHP's values and was the single most important document at BHP: page 22.

The FY2013 annual report stated that the Charter was the single most important means by which BHP communicated who it was, what it did, and what it stood for; that it was through the Charter it articulated its purpose, its strategy, the values it upheld and how it measured success; and that the Charter was the foundation for BHP's decision-making, actions and behaviours: page 2.

The FY2013 Summary Review stated that there was nothing more important than the Charter values; and that the Charter values were shared by BHP's people in the workplace and in communities in which BHP worked and lived: page 4.

The FY2014 annual report stated that BHP's Charter values and commitment to putting health and safety first, being environmentally responsible and supporting the communities in which it operated will remain unchanged: page 18.

54. On or about 21 September 2011, BHP Ltd published or caused to be published the BHP FY2011 annual report on or to the ASX, which stated *inter alia* that:
- (a) BHP operated in an industry where the foundation for everything it did was its commitment to the health and safety of its people and sustainability of the environment and communities in which it worked;
 - (b) BHP's approach to sustainability was reflected in *Our BHP Billiton Charter*, which defined BHP's values, purpose and how BHP measured success, and the *BHP Billiton Sustainable Development Policy*, which defined BHP's public commitments to safety, health, and environmental and social responsibility;
 - (c) identifying and managing material risk for BHP included focusing on sustainability-specific risks for its people, the environment and its host communities;
 - (d) BHP's licence to operate included a central focus on health, safety, environment and the community, and making a positive difference to its host communities; and

- (e) BHP's overriding commitment was to safety: ensuring the safety of its people, respecting its environment and the communities in which it worked, and this commitment transcended everything BHP did and guided every aspect of its work;
- (f) tailings dams were assessed to manage the risk of failure;
- ~~(a)~~(g) tailings dams were designed and operated to well-established engineering standards.

Particulars

BHP FY2011 annual report, pages 4, 45, 48, 51 and 81.

- 54A. On or about 21 September 2011, BHP Ltd published or caused to be published the BHP FY2011 Sustainability Report on or to the ASX, which stated *inter alia* that:
- (a) BHP's approach to sustainability was reflected in *Our BHP Billiton Charter*, which defined its values, purpose and how BHP measures success, and the BHP Billiton Sustainable Development Policy, which defined BHP's public commitments to safety, health, environmental and social responsibility;
 - (b) BHP applied uniform expectations for safety outcomes wherever they worked in the world;
 - (c) tailings dams were assessed to manage the risk of failure;
 - (a) tailings dams were designed and operated to well-established engineering standards.

Particulars

BHP FY2011 Sustainability Report, pages 3, 8 and 15.

55. On or about 18 September 2012, BHP Ltd published or caused to be published the BHP FY2012 annual report on or to the ASX, which stated *inter alia* that:
- (a) supporting BHP's communities was part of *Our BHP Billiton Charter* value of Sustainability, which also included putting the health and safety of its people first and being environmentally responsible and these were set out in *Our Charter*, which was the foundation of everything they did at BHP;

- (b) through the application of BHP's risk management processes, BHP identified material catastrophic operational risks and implemented the critical controls and performance requirements to maintain control effectiveness;
- (c) BHP's *Our BHP Billiton Charter* value of Sustainability reflected BHP's priority of putting health and safety first, being environmentally responsible and supporting its communities;
- (d) tailings dams were constructed and operated to engineering standards, and monitored and assessed to manage material risks, including the risk of failure;
- (e) BHP's licence to operate included a central focus on health, safety, environment and the community and making a positive difference to its host communities; and
- (f) BHP's overriding commitment was to safety: ensuring the safety of its people, respecting its environment and the communities in which it worked, and this commitment transcended everything BHP did and guided every aspect of its work.

Particulars

BHP FY2012 annual report, pages 4, 12, 46, 49 and 81.

- 55A. On or about 18 September 2012, BHP Ltd published or caused to be published the BHP FY2012 Summary Review on or to the ASX, which stated *inter alia* that:
- (a) supporting BHP's communities was part of *Our BHP Billiton Charter* value of Sustainability, which also included putting the health and safety of BHP's people first and being environmentally responsible; and
 - (b) BHP continued to focus on safety with a commitment to establish best practice in this area.

Particulars

BHP FY2012 Summary Review, pages 6 and 7.

- 55B. On or about 18 September 2012, BHP Ltd published or caused to be published the BHP FY2012 Sustainability Report on or to the ASX, which stated *inter alia* that:

- (a) regardless of BHP's rate of growth, the ability to grow its organisation safely was essential;
- (b) BHP remained vigilant in its focus on material risks, ensuring that it had the appropriate controls in place to address these risks and that its people were appropriately trained; and
- (c) tailings dams were constructed and operated to engineering standards, and monitored and assessed to manage material risks including the risk of failure.

Particulars

BHP FY2012 Sustainability Report, pages 10 and 21.

- 55C. On or about 20 February 2013, BHP Ltd published or caused to be published and/or made available to the ASX a transcript of its interim results investor and analyst briefing, in which its CEO stated:

"But let me begin, as I always do, by discussing one of our core charter values – sustainability. The basic premise of putting health and safety first, being environmentally responsible and providing support for the communities in which we operate is intrinsically tied to our licence to operate."

Particulars

Transcript of interim results investor and analyst briefing, page 2.

56. On or about 25 September 2013, BHP Ltd published or caused to be published the BHP FY2013 annual report on or to the ASX, which stated *inter alia* that:
- (a) health and safety always came first;
 - (b) BHP's primary responsibility was the health, safety and wellbeing of its people;
 - (c) BHP's priorities in the near term were *inter alia* to protect its people, improve the health and safety of its operations, and support sustainable development of its host communities;
 - (d) eliminating risk was a critical, continual focus of everyone at BHP;
 - (e) BHP was guided by the BHP Charter values of *inter alia* Sustainability;
 - (f) BHP's overriding commitment to ensuring the safety of its people and respecting the environment and the communities in which it worked informed everything it did and influenced every aspect of its work;

- (g) BHP's BHP Billiton Charter value of Sustainability reflected its priority of putting health and safety first, being environmentally responsible and supporting its communities;
- (h) BHP remained vigilant in its focus on material safety risks, ensuring it had the appropriate controls in place to address these risks; and
- (i) Tailings dams were operated, monitored and assessed to manage material risks, including the risk of failure.

Particulars

BHP FY2013 annual report, pages 6, 7, 8, 52, 53 and 56.

- 56A. On or about 25 September 2013, BHP Ltd published or caused to be published the BHP FY2013 Summary Review on or to the ASX, which stated *inter alia* that:
- (a) health and safety always came first; and
 - (b) guided by its *Our BHP Billiton Charter* and consistent strategy, BHP's priorities in the near term were to protect its people and improve the health and safety of its operations (among other things).

Particulars

BHP FY2013 Summary Review, pages 6 and 7.

- 56B. On or about 25 September 2013, BHP Ltd published or caused to be published the BHP FY2013 Sustainability Report on or to the ASX, which stated *inter alia* that:
- (a) BHP's first *Charter* value of sustainability, putting health and safety first, being environmentally responsible and supporting BHP's communities, underpinned everything BHP did;
 - (b) BHP was focused on identifying and managing its material risks to protect its people and improve the safety of its operations;
 - (c) BHP remained vigilant in its focus on material safety risks, ensuring they had the appropriate controls in place to address these risks and that its people were appropriately trained; and
 - (d) tailings dams were operated, monitored and assessed to manage material risks, including the risk of failure.

Particulars

BHP FY2013 Sustainability Report, pages 1, 14 and 30.

57. On or about 25 September 2014, BHP Ltd published or caused to be published the BHP FY2014 annual report on or to the ASX, which stated *inter alia* that:
- (a) BHP's first Charter value was Sustainability and BHP maintained a relentless focus on the health and safety of its people and the communities in which it operated;
 - (b) BHP would continue to relentlessly identify and manage material health and safety risks to protect its people and communities;
 - (c) BHP was guided by the BHP Charter values of *inter alia* Sustainability;
 - (d) BHP's overriding commitment to ensuring the safety of its people and respecting the environment and the communities in which it works informed everything it did and influenced every aspect of its work;
 - (e) through the application of BHP's risk management processes, BHP identified catastrophic operational risks and implemented the critical controls and performance requirements to maintain control effectiveness; and
 - (f) BHP had systems in place to identify and effectively manage foreseeable crises and emergencies, including by undertaking annual assessments to verify that critical controls were effective in managing each material risk.

Particulars

BHP FY2014 annual report, pages 8, 9, 10, 25 and 52.

- 57A. On or about 25 September 2014, BHP Ltd published or caused to be published the BHP FY2014 Sustainability Report on or to the ASX, which stated *inter alia* that:
- (a) BHP's approach to sustainability reflected its priority to put health and safety first, be environmentally responsible and provide support to its host communities; and
 - (b) BHP's priority was to identify, understand and manage the material risks within its business, ensuring its people, suppliers, contractors and the communities in which it operated remained safe and healthy.

Particulars

BHP FY2014 Sustainability Report, pages 3 and 15.

- 57B. On or about 25 September 2014, BHP Ltd published or caused to be published an Environmental, Social and Governance Briefing on or to the ASX, which stated *inter alia* that:
- (a) BHP identified and managed its material sustainability risks; and
 - (b) BHP's operations had systems in place to identify and effectively manage health and safety risks.

Particulars

Environmental, Social and Governance Briefing, pages 8 and 15.

58. On or about 23 September 2015, BHP Ltd published or caused to be published the BHP FY2015 annual report on or to the ASX, which stated *inter alia* that:
- (a) safety was the first priority for everyone at BHP;
 - (b) the safety and health of its people and of the broader communities in which it operated were central to its success;
 - (c) it would continue to operate sustainably with a focus on *inter alia* protecting its people and improving the health and safety of its operations; and
 - (d) identifying and managing fatal and material risk was a critical component of its management strategy.

Particulars

BHP FY2015 annual report, pages 5, 6 and 16.

- 58A. On or about 23 September 2015, BHP Ltd published or caused to be published the BHP FY2015 Sustainability Report on or to the ASX, which stated *inter alia* that:
- (a) BHP's priority was to identify and manage the material risks within its Company, ensuring its people, suppliers, contractors and the communities in which it operated remained safe and healthy;
 - (b) BHP ensured that through management systems and internal audit processes, it assessed, prevented or mitigated potential environmental, health and safety risks to its people and communities;
 - (c) the health and safety of its people and of the broader communities in which it operated was central to every aspect of its business.

Particulars

BHP FY2015 Sustainability Report, pages 3, 15 and 24.

59. BHP Ltd represented, from prior to and throughout the Relevant Period, that:
- (a) the primary consideration in every aspect of BHP's business was the safety of its people and the safety and sustainability of the environment and the communities in which it, and its subsidiaries, carried on business;
 - (b) it had effective systems and processes in place such that it was identifying and effectively managing material risks to the safety of its people and the safety and sustainability of the environment and the communities in which it, and its subsidiaries, carried on business, including its mining operations and/or the Samarco mining operation;
 - (c) it was managing its mining assets, including the Samarco mining operation, safely to manage material risks, including the risk of dam failure; and/or
 - (d) its mining assets, including the Samarco mining operation, were operated safely to manage material risks, including the risk of dam failure,

(the **Representations**).

Particulars

The Representations were partly express and partly implied.

To the extent that they were express, the Joint Applicants refer to paragraphs 53A-58A above.

To the extent that they were implied, they were to be implied from the matters referred to in paragraphs 53A-58A above.

60. BHP Ltd did not, at any time before 9 November 2015, withdraw or qualify any of the Representations and each Representation was a continuing representation throughout the Relevant Period.

I.2 Misleading or Deceptive Conduct Contraventions

61. The conduct of BHP Ltd pleaded in paragraphs 53A-60 above was conduct:
- (a) in trade or commerce in relation to financial services within the meaning of s 12DA(1) of the ASIC Act; and/or

- (b) in relation to a financial product or financial services (being BHP Ltd Shares) within the meaning of s 1041H(1) and s 1041H(2) of the Corporations Act.

62. By no later than:

- (a) 8 August 2012;
- (b) alternatively, 30 November 2012;
- (ba) alternatively, 31 December 2013;
- (bb) alternatively, 31 July 2014;
- (c) alternatively, ~~27 August~~ 20 November 2014;
- (d) alternatively, 6 April 2015;

and at all times thereafter until the end of the Relevant Period, the Representations were misleading or deceptive, or likely to mislead or deceive.

Particulars

By no later than 8 August 2012, alternatively 30 November 2012, alternatively 31 December 2013, alternatively 31 July 2014, alternatively 27 August 20 November 2014, alternatively 6 April 2015, and at all material times thereafter until the end of the Relevant Period, BHP Ltd: (i) acquiesced in Samarco not safely managing the operation of the Fundão Dam; and/or (ii) failed to ensure that Samarco was safely managing the operation of the Fundão Dam.

By no later than ~~27 August 2014, alternatively 6 April 2015,~~ and at all material times thereafter until the end of the Relevant Period 8 August 2012, BHP Ltd: (i) acquiesced in Samarco managing the operation of the Fundão Dam in a manner ~~that exposed the Fundão Dam to an extreme risk of failure where the safety of the Fundão Dam was significantly inadequate, the dam posed a moderate to high risk, and the dam was conditionally unsafe;~~ and/or (ii) failed to ensure that ~~Samarco the Fundão Dam~~ was managing the operation of the Fundão Dam in a manner ~~that did not expose the Fundão Dam to an extreme risk of failure where the safety of the Fundão Dam was adequate, the dam did not pose a moderate to high risk, and the dam was not conditionally unsafe.~~

By no later than 30 November 2012, BHP Ltd: (i) acquiesced in Samarco managing the operation of the Fundão Dam in a manner where the initiation of the failure of the Fundão Dam was foreseen, the dam posed a very high risk, and the dam was unsafe or potentially unsafe; and/or (ii) failed to ensure that Samarco was managing the operation of the Fundão Dam in a manner where the failure of the Fundão Dam was not foreseen, the dam did not pose a very high risk, and the dam was not unsafe or potentially unsafe.

By no later than 31 December 2013, alternatively 31 July 2014, BHP Ltd: (i) acquiesced in Samarco managing the operation of the Fundão Dam in a manner where it posed an extremely high risk and the dam was unsafe; and/or (ii) failed to ensure that Samarco was managing the operation of the Fundão Dam in a manner where the Fundão Dam did not pose extremely high risk and the dam was unsafe.

By no later than 20 November 2014, alternatively 6 April 2015, BHP Ltd: (i) acquiesced in Samarco managing the operation of the Fundão Dam in a manner where the dam was critically near failure, posed an extremely high risk, and was unsafe; and/or (ii) failed to ensure that Samarco was managing the operation of the Fundão Dam in a manner where the Fundão Dam was not critically near failure, did not pose an extremely high risk, and was not unsafe.

By no later than 8 August 2012, alternatively 30 November 2012, alternatively 31 December 2013, alternatively 31 July 2014, alternatively 27 August 20 November 2014, alternatively 6 April 2015 and at all material times thereafter until the end of the Relevant Period, BHP was not operating the Samarco mining operation safely to manage material risks, including the risk of dam failure, and/or the Samarco mining operation was not operated safely to manage material risks, including the risk of dam failure.

As to the true position, the Joint Applicants:

- i. refer to the Panel Report:
- ii. refer to the matters pleaded in sections G.1 to G.5A above; and
- iii. will rely on their geotechnical expert report to be filed in the proceeding refer to the Overton Report, Section 7.0.

~~Further particulars may be provided after further discovery and the filing of expert reports.~~

63. By reason of the matters pleaded in paragraphs 61 and 62 above, on and from no later than 8 August 2012 and at all material times thereafter until the end of the Relevant Period, BHP Ltd contravened:

- (a) s 12DA(1) of the ASIC Act; and
 - (b) s 1041H(1) of the Corporations Act,
- (the **Misrepresentations Contraventions**).

J. THE DAM FAILURE

64. At around 3.30pm on 5 November 2015 in Brazil (around 4.30am AEST on 6 November 2015 in Australia), the Fundão Dam experienced a global failure:

- (a) releasing a significant volume of tailings; and
- (b) resulting in, among other things:

- (i) the shutdown of the Germano Complex, with it yet to be re-opened as at the date of the commencement of this proceeding;
- (ii) BHP's future iron ore production capabilities being revised downwards;

Particulars

BHP's share of production of iron ore pellets was 5.2 Mt in FY2016, down from 14.5 Mt in FY2015 and 11 Mt in FY2014 (BHP FY2016 annual report, page 58; BHP FY2015 annual report, page 83; BHP FY2014 annual report 2014, page 41).

~~Further particulars may be provided after discovery.~~

- (iii) BHP's iron ore cashflow and/or earnings generated by the Samarco mining operation being lost or significantly reduced for a substantial period of time; and

Particulars

BHP's consolidated income for iron ore for FY2016 was US\$10.538B, down from US\$14.753B in FY2015 and US\$21.356B in FY2014 (BHP FY2016 annual report, page 68).

~~Further particulars may be provided after discovery.~~

- (iv) BHP being exposed to:
 - (A) substantial remediation costs; and
 - (B) significant reputational damage.

K. INFORMATION DISCLOSURE AND SHARE PRICE IMPACTS

- 65. On 6 November 2015, BHP Ltd made an announcement on the ASX that there had been a serious incident at Samarco (the **6 November 2015 Announcement**).

Particulars

BHP ASX release entitled "INCIDENT AT SAMARCO" dated 6 November 2015.

- 66. On 9 November 2015, BHP Ltd made an announcement on the ASX about the failure of the Fundão Dam and some of the consequences of that failure (the **9 November 2015 Announcement**).

Particulars

BHP ASX release entitled "UPDATE: INCIDENT AT SAMARCO" dated 9 November 2015.

67. Following the 6 November 2015 Announcement and/or the 9 November 2015 Announcement, the price of:

(a) the BHP Ltd Shares; and/or

(b) the BHP Plc Shares,

declined significantly.

Particulars

The price of the BHP Ltd Shares published by the ASX declined from a closing price of \$23.28 on 5 November 2015 to a closing price of \$18.09 on 30 November 2015.

The price of the BHP Plc Shares published by the LSE declined from a closing price of GBP 10.34 on 5 November 2015 to a closing price of GBP 7.96 on 30 November 2015.

The price of the BHP Plc Shares published by the JSE declined from a closing price of ZAR 221.59 on 5 November 2015 to a closing price of ZAR 170.30 on 30 November 2015.

Further particulars will be provided after ~~expert evidence~~ and the determination of common questions.

L. CONTRAVENTIONS CAUSED LOSS

L.1 BHP Ltd Shares

68. During the Relevant Period, the BHP Ltd Share Markets were markets:

(a) in which the disclosure by BHP Ltd of information concerning BHP was regulated by, inter alia, ss 674(2) and 1041H of the Corporations Act, Rule 3.1 of the Listing Rules and s 12DA of the ASIC Act;

(b) in which the price at which BHP Ltd Shares traded was, and was reasonably expected to have been, influenced by the material information concerning BHP that was published on or to the ASX or that otherwise became publicly available;

(c) in which material information, namely the Safety and Capacity Information, August 2012 Information, November 2012 Information, the December 2013

Information, the Pre-27 August July 2014 Information, Post-August November 2014 Information, the April 2015 Information, General Consequential Risks and BHP Consequential Risks, had not been disclosed, which a reasonable person would expect, had it (or alternatively, any combination or subset thereof) been disclosed, would have had a material adverse effect on the price or value of the BHP Ltd Shares; and

- (d) in which misleading or deceptive conduct, namely the Representations, had occurred, which a reasonable person would expect to have a material effect on the price or value of BHP Ltd Shares.

Particulars

The matters alleged in subparagraph 68(b) are to be inferred from, inter alia, the matters alleged in paragraph 67 and the particulars subjoined thereto and in subparagraph 68(a).

Further particulars will be provided following ~~expert evidence and the~~ determination of common questions.

69. During the Relevant Period:

- (a) the Continuous Disclosure Contraventions; and/or
- (b) the Misrepresentations Contraventions,

(collectively, the **Contraventions**) caused the price at which BHP Ltd Shares traded to be higher than their true value and/or the market price that would have prevailed but for the Contraventions (or any of them).

Particulars

This is to be inferred from paragraphs 64-67 above and the particulars subjoined thereto.

Particulars of the extent to which the Contraventions caused the price at which BHP Ltd Shares traded on the ASX and on or through any other financial market, trading platform or means of trading to be higher than their true value and/or the market price that would have prevailed but for the Contraventions (or any of them) will be provided after the filing of expert reports.

69A. By reason of the matters alleged in the preceding paragraph, the Joint Applicants and those Group Members who acquired an interest in BHP Ltd Shares during the Relevant Period did so at a price that was higher than their true value and/or the market price that would have prevailed but for the Contraventions (or any of them).

70. Further or in the alternative to paragraphs 68, 69 and 69A above, the Joint Applicants and some of the Group Members who acquired an interest in BHP Ltd Shares during the Relevant Period would not have acquired an interest in the BHP Ltd Shares, or would not have chosen to acquire an interest in the BHP Ltd Shares at the prices and volume that they did, if the Contraventions that had occurred at the time of their acquisition (or any of them) had not occurred.

Particulars

The Joint Applicants and some Group Members acquired an interest in the BHP Ltd Shares in reliance upon the Representations.

The Joint Applicants would not have acquired an interest in the BHP Ltd Shares had the information the subject of the Required Disclosures (or any of them) been disclosed, or had the Representations been retracted, corrected or qualified prior to such acquisition.

The identities of all those Group Members which or who would not have acquired an interest in BHP Ltd Shares or would not have chosen to acquire an interest in BHP Ltd Shares at the prices and volume that they did, had information the subject of the Required Disclosures (or any of them) been disclosed or had the Representations been retracted, corrected or qualified prior to such acquisition, will be obtained and provided following opt out, the determination of the Joint Applicants' claims and identified common issues at an initial trial and if, and when, it is necessary for a determination to be made of the individual claims of those Group Members.

L.2 BHP Plc Shares

71. During the Relevant Period, the BHP Plc Share Markets were markets in which the price at which BHP Plc Shares traded was, and was reasonably expected to have been, influenced by material information concerning BHP that became publicly available to the BHP Plc Share Markets.

Particulars

The matters alleged are to be inferred from, inter alia, the matters alleged in paragraph 67 and the particulars subjoined thereto.

Further particulars will be provided following ~~expert evidence~~ and the determination of common questions.

72. During the Relevant Period, material information concerning BHP disclosed by BHP Ltd to the ASX became publicly available to the BHP Plc Share Markets.

Particulars

Material information concerning BHP disclosed by BHP Ltd to the ASX became publicly available to the BHP Plc Share Markets by reason of the fact that

company announcements disclosed to the ASX became publicly available on the ASX website www.asx.com.au.

~~*Further particulars may be provided after discovery and expert evidence.*~~

73. Further and in the alternative to paragraphs 71 and/or 72 above, during the Relevant Period, the BHP Plc Share Markets were markets in which the price at which BHP Plc Shares traded was influenced by the price and/or movements in the price of BHP Ltd Shares and/or by the price of BHP Plc Shares on the LSE or the JSE.

Particulars

This is to be inferred from paragraphs 9, 10 and/or 67 and 68 above and the particulars subjoined thereto.

~~*Further particulars will be provided after the filing of expert reports and the determination of common questions.*~~

74. By reason of the matters pleaded at paragraphs 71, 72 and/or 73 above, during the Relevant Period, the Contraventions caused the price at which BHP Plc Shares traded to be higher than their true value and/or the market price that would have prevailed but for the Contraventions (or any of them).

Particulars

This is to be inferred from paragraphs 9, 10, 65, 66, 67, 71, 72 and/or 73 above the particulars subjoined thereto.

Particulars of the extent to which the Contraventions caused the price at which BHP Plc Shares traded on the LSE, JSE and on or through any other financial market, trading platform or means of trading, to be higher than their true value and/or the market price that would have prevailed but for the Contraventions (or any of them) will be provided following service of expert quantum evidence.

- 74A. By reason of the matters alleged in the preceding paragraph, those Group Members who acquired an interest in BHP Plc Shares during the Relevant Period did so at a price that was higher than their true value and/or the market price that would have prevailed but for the Contraventions (or any of them).
75. Further or in the alternative to paragraphs 74 and 74A above, some of the Group Members who acquired an interest in BHP Plc Shares during the Relevant Period would not have acquired an interest in the BHP Plc Shares, or would not have chosen to acquire an interest in the BHP Plc Shares at the prices and volume that they did, if the Contraventions that had occurred at the time of their acquisition (or any of them) had not occurred.

Particulars

The identities of all those Group Members which or who would not have acquired an interest in BHP Plc Shares, or would not have chosen to acquire an interest in BHP Plc Shares at the prices and volume that they did, had the Required Disclosures (or any of them) been disclosed or had the Representations been retracted, corrected or qualified prior to such acquisition, will be obtained and provided following opt out, the determination of the Joint Applicants' claims and identified common issues at an initial trial and if, and when, it is necessary for a determination to be made of the individual claims of those Group Members.

76. [Deleted.]

77. [Deleted.]

78. [Deleted.]

79. [Deleted.]

80. [Deleted.]

M. LOSS OR DAMAGE SUFFERED BY THE JOINT APPLICANTS AND GROUP MEMBERS

81. Each of the Joint Applicants suffered loss and/or damage in relation to its interests in BHP Ltd Shares by and resulting from the Contraventions (or any one or combination of the Contraventions).

Particulars

The loss suffered by each of the Joint Applicants will be calculated by reference to:

- i. the difference between the price at which it acquired its interests in BHP Ltd Shares during the Relevant Period and the true value of those interests; or*
- ii. alternatively, the difference between the price at which it acquired its interests in BHP Ltd Shares during the Relevant Period and the market price that would have prevailed had the Contraventions not occurred; or*
- iii. alternatively, on the days when the traded price of BHP Ltd Shares fell as a result of the disclosure of information the subject of the Contraventions, the quantum of that fall; or*
- iv. alternatively, the difference between the price at which the Joint Applicants each acquired the BHP Ltd Shares and whatever is "left in hand".*

~~*Particulars of the Joint Applicants' losses will be provided after the filing of expert reports.*~~

82. Group Members who acquired an interest in:

- (a) BHP Ltd Shares; and/or
- (b) BHP Plc Shares,

during the Relevant Period have suffered loss and/or damage in relation to their interests in those shares by and resulting from the Contraventions (or any one or combination of the Contraventions).

Particulars

The losses suffered by Group Members who acquired an interest in BHP Ltd Shares and/or BHP Plc Shares during the Relevant Period will also be calculated in accordance with the particulars subjoined to paragraph 81 above but are not particularised in this statement of claim. Particulars in relation to Group Members' losses will be obtained and provided following opt out, the determination of the Joint Applicants' respective claims and identified common issues at an initial trial and if, and when, it is necessary for a determination to be made of the individual claims of those Group Members.

82A. To the extent that (which is not admitted by the Joint Applicants):

- (a) there are certain Group Members who only became Group Members on 5 December 2023 by reason of the orders of the Court made on 12 February 2025; and
- (b) the proceeding and/or the application made and/or the action in respect of those Group Members' claims was started more than 6 years after the contraventions the subject of their claims and/or 6 years after the day on which their causes of action accrued and/or arose:

it is the case that:

- (c) the Court ought make orders under s 1322(4)(d) of the Corporations Act extending the period(s) to start the proceeding (within the meaning of s 1317K) and/or to make the application (within the meaning of s 1325(2)) and/or to begin the action (within the meaning of s 1041I(2)) in respect of those Group Members's claims to a date on or after 5 December 2023; and
- (d) no substantial injustice has been or is likely to be caused to any person by the Court making such orders.

83. The Joint Applicants claim the relief set out in the second further amended consolidated originating application on their own behalves and on behalf of the Group Members.

Dated: ~~16 October 2024~~ 25 March 2025



.....
Signed by Cameron Myers
Lawyer for the Joint Applicants



.....
Signed by Lee Taylor
Lawyer for the Joint Applicants

This pleading was prepared by P W Collinson, one of Her Majesty's Counsel, E Levine and D Snyder of Counsel, and amended by P W Collinson, one of Her Majesty's Counsel, A D Pound and E Levine of Counsel, and further amended by P W Collinson, one of His Majesty's Counsel, A D Pound SC and E Olivier of Counsel, and further amended by P W Collinson and C O A Parkinson of His Majesty's Counsel, and E Levine and E L Olivier of Counsel, and further amended by P W Collinson and C O A Parkinson of His Majesty's Counsel, and E Levine and E L Olivier of Counsel.

ANNEXURE A**Impiombato's trade in BHP Ltd Shares during the Relevant Period**

Date	Trade Type	Volume	Price per security	Transaction value
5 December 2014	Buy	1,000	\$30.68	\$30,713.75
12 December 2014	Buy	1,000	\$28.57	\$28,601.43
23 January 2015	Sell	1,000	\$29.24	\$29,208.99
2 February 2015	Sell	900	\$29.75	\$26,745.05
13 February 2015	Sell	100	\$32.14	\$3,195.05
28 October 2015	Buy	2,000	\$23.80	\$47,630.36
28 October 2015	Buy	3,000	\$23.85	\$71,581.69
30 October 2015	Buy	3,000	\$23.05	\$69,204.07
2 November 2015	Buy	2,000	\$22.89	\$45,808.36
6 November 2015	Buy	1,180	\$22.64	\$26,722.59
9 November 2015	Sell	11,180	\$21.79	\$243,366.04

ANNEXURE B**Klemweb's trade in BHP Ltd Shares during the Relevant Period**

Date	Trade Type	Volume	Price per security	Transaction value
18 April 2013	Buy	1,650	\$30.76	\$50,754.00
17 December 2013	Buy	600	\$35.69	\$21,414.00
17 June 2015	Buy	1760	\$28.24	\$50,112.45

Certificate of lawyers

I, Cameron Myers, certify to the Court that, in relation to the statement of claim filed on behalf of the Joint Applicants, the factual and legal material available to each of us at present provides a proper basis for each allegation in the pleading.

Date: ~~16 October 2024~~ 25 March 2025



.....
Signed by Cameron Myers
Lawyer for Joint Applicants

I, Lee Taylor, certify to the Court that, in relation to the statement of claim filed on behalf of the Joint Applicants, the factual and legal material available to each of us at present provides a proper basis for each allegation in the pleading.

Date: ~~16 October 2024~~ 25 March 2025



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Signed by Lee Taylor
Lawyer for the Joint Applicants