

Module: Introduction - 2012 CDP Water Disclosure**Page: Introduction - 2012 CDP Water Disclosure****0.1****Introduction**

Please give a general description and introduction to your organization.

AngloGold Ashanti, one of the world's leading gold producers, has a portfolio of long-life, relatively low-cost assets with a variety of orebody types in key gold-producing regions around the world.

AngloGold Ashanti is a global gold mining company and the world's third largest gold producer. Headquartered in Johannesburg, South Africa, AngloGold Ashanti has 20 operations on four continents and several exploration programmes in both the established and new gold producing regions of the world. AngloGold Ashanti produced 4.33Moz of gold in 2011, generating \$6.6bn in gold income. Capital expenditure in 2011 amounted to \$1.53bn. As at 31 December 2011, AngloGold Ashanti's Ore Reserve totalled 75.6Moz.

The primary listing of the company's ordinary shares is on the JSE Limited (JSE). Its ordinary shares are also listed on stock exchanges in London, and Ghana, as well as being quoted in New York in the form of American Depositary Shares (ADSs), in Australia, in the form of CHESS Depositary Interests (CDIs) and in Ghana, in the form of Ghanaian Depositary Shares (GhDSs).

0.2**Reporting Year**

Please state the start and end date of the year for which you are reporting data.

Enter the period that will be disclosed.

Sat 01 Jan 2011 - Sat 31 Dec 2011

0.3

Reporting Boundary

Please indicate the category that describes the reporting boundary for companies, entities, or groups for which water-related impacts are reported.

Companies, entities or groups over which operational control is exercised

0.4

Exclusions

Are there any geographies, facilities or types of water inputs/outputs within this boundary which are not included in your disclosure?

Yes

0.4a

List of Exclusions

Please describe any exclusion(s) in the following table.

Exclusion	Please explain why you have made the exclusion
Exploration activities and administration offices located in urban centres	The water consumed at administration offices and during exploration activities is estimated to comprise less than 1% of the company's total water consumption.

1.1

Does your company have a water policy, strategy or management plan?

Yes

1.1a

Please describe your policy, strategy or plan, including the highest level of responsibility for it within your company and its geographical reach.

Country or geographical reach	Description of policy, strategy or plan	Position of responsible person
Global	AngloGold Ashanti has an Integrated Environment and Community Policy, which includes commitments to: - Manage efficiently and safely the resources under its stewardship and respect the values, traditions and cultures of the local and indigenous communities in which we operate; - Work to prevent pollution and minimise waste from our activities; - Undertake initiatives in partnership with the societies in which we operate with the aim of contributing to a sustainable future for host communities; - Ensure financial resources are available to meet our closure obligations; - Establish, maintain, continually improve and audit management systems to identify, monitor and - Control the environmental and community aspects of our activities. The company also has a Water Management Standard, which sets specific requirements for all operations in regard to water management, including a requirement to have a water management programme. This management programme includes, amongst others: - measured withdrawals and/or consumption of water; and measured water discharge volumes and/or quality; - engagement with local communities on water quality impacts; - engagement with authorities on water supply, security and access; - improvement of water use efficiency by increasing reuse of water, thus reducing abstraction of fresh water.	Board/executive board

1.1b

Does the water policy, strategy or plan specify water-related targets or goals?

Yes

1.1c

Please describe these water-related targets or goals and the progress your company has made against them.

Country or geographical reach	Category of target or goal type	Description of target or goal	Progress against target or goal
Global	Direct operations	A target to maintain water accounting accuracy of 90% or better.	Initial data will be available at the end of 2012.

1.2

Do you wish to report any actions outside your water policy, strategy or management plan that your company has taken to manage water resources or engage stakeholders in water-related issues?

Country or geographical reach	Category of action	Description of action and outcome
Global	Community engagement	For new projects, the company engages with local communities on water use and supply (for operational and community purposes). Consideration is given to the sensitivity of receiving catchments in siting, design and management of facilities.
Global	Public policy	As water supply is critical to the company's operations and employee and community health, we engage with public policy makers in each country in which we operate in order to influence policy direction. Where water is scarce or water management is controversial this has particular emphasis.

2.1

Are any of your operations located in water-stressed regions?

Yes

2.1a

Please specify the method(s) you use to characterize water-stressed regions (you may choose more than one method).

Method used to define water stress	Please add any comments here:
WBCSD Water Tool	This index compares the total water availability to total water use (domestic, industrial and agricultural use). The measure was done using the Mean Annual Relative Water Stress Index (WSI) (Source: UNH, 2000).

2.1b

Please list the water-stressed regions where you have operations and the proportion of your total operations in that area.

Country or geographical reach	Region within country	Proportion of operations located in this region (%)	Further comments
South Africa	Merafong	1 – 10	Using the WSI (UNH, 2000), the West Wits operation, which borders the Gauteng and the North West provinces, is in an area that experiences a Medium Level water stress.
United States of America	Colorado	1 – 10	Using the WSI (UNH, 2000), the CC&V operation is in an area that experiences a Medium Level water stress.
Australia	Western Australia	1 – 10	Using the WSI (UNH, 2000), the Sunrise Dam operation is in an area that is Water Scarce.
Namibia	Erongo	1 – 10	Using the WSI (UNH, 2000), the Navachab operation is in an area that is Water Scarce.
South Africa	KOSH	1 – 10	Using the WSI (UNH, 2000), the Vaal River operation is in an area that is Water Scarce.

2.2

Are there other indicators (besides water stress) which you wish to report that help you to identify which of your operations are located in regions subject to water-related risk?

Yes

2.2a

Please list the regions at risk where you have operations, the relevant risk indicator and proportion of your total operations in that area.

Country or geographical reach	Region within country	Risk Indicator	Proportion of operations located in this region (%)	Further comments
South Africa	KOSH and Merafong	Flooding	11-20	AngloGold Ashanti has identified a flooding and future pollution risk posed by deep groundwater in the Klerksdorp and Far West Rand goldfields. AngloGold Ashanti's Vaal River operations are part of the Klerksdorp goldfield and its West Wits operations are part of the Far West Rand goldfield. Various studies have been undertaken by AngloGold Ashanti since 1999. Due to the interconnected nature of underground mining operations in South Africa, any proposed solution needs to be a combined one supported by all the companies owning mines located in these goldfields. As a result, the South African Department of Mineral Resources and affected mining companies are now involved in the development of a Regional Mine Closure Strategy.
South Africa	KOSH and Merafong	Poor water quality	11-20	Deep groundwater contamination is a significant issue in South Africa, where groundwater in some older mining regions has infiltrated mined-out workings. It becomes acidic if exposed to sulphide minerals in these workings, presenting a potential contamination risk to shallow groundwater and eventually surface water resources if allowed to spread.

2.3

Please specify the total proportion of your operations that are located in the regions at risk which you identified in questions 2.1 and/or 2.2.

36%

2.4

Please specify the basis you use to calculate the proportions used for questions 2.1 and/or 2.2.

Basis used to determine proportions	Please add any comments here
Number of facilities	The company has fourteen operations.

2.5

Do any of your key inputs or raw materials (excluding water) come from regions subject to water-related risk?

Yes

2.5a

Please state or estimate the proportion of your key inputs or raw materials that come from regions subject to water-related risk.

Input or material	Proportion of key input or raw material that comes from region at risk (%)	Unit used for calculating percentage	Further comments
Grid electricity	51 – 60	Value of material purchased	Grid electricity procured from water stressed regions in South Africa, Namibia and the USA.

Further Information

The bulk of the company's procurement is of reagents, fuels, heavy mobile equipment and spares for this equipment. Availability and cost of these items are largely independent of water supply.

3.1

Is your company exposed to water-related risks (current or future) that have the potential to generate a substantive change in your business operation, revenue or expenditure?

Yes

3.1a

Please describe (i) the current and/or future risks to your operations, (ii) the ways in which these risks affect or could affect your operations before taking action, (iii) the estimated timescale of these risks, and (iv) your current or proposed strategies for managing them.

Country or geographical reach	Risk type	Potential business impact	Estimated timescale (years)	Risk management strategies
South Africa	02. Physical: Flooding	Current flooding risk owing to the ingress of underground water into mine workings from adjacent higher level mines that cease pumping.	Current	AngloGold Ashanti's Vaal River operations are part of the Klerksdorp goldfield and its West Wits operations are part of the Far West Rand goldfield. Various studies have been undertaken by AngloGold Ashanti since 1999. Due to the interconnected nature of underground mining operations in South Africa, any proposed solution needs to be a combined one supported by all the companies owning mines located in these goldfields. As a result, the South African Department of Mineral Resources and affected mining companies are now involved in the development of a Regional Mine Closure Strategy.
Ghana	16. Other: Inadequate infrastructure	Inadequate infrastructure leading to disruption of production.	Current	Process water treatment plants are being constructed to enable better management of excess water at the mines.
Mali	03. Physical: Increased water stress or scarcity	Increased water stress or scarcity leading to disruption of operations.	Current	Maximising recirculation of process water and the re-use of mine pit water in the processing areas in order to reduce dependence on groundwater abstraction.
South Africa	03. Physical: Increased water stress or scarcity	Increased water stress or scarcity leading to disruption of operations.	11 – 20	Maximising recirculation and reuse of processing and mine water in order to reduce dependence on water supplied by the local utilities, or abstracted from the Vaal River.
Australia	02. Physical: Flooding	Halt to operations as a result of flooding.	Current	Unprecedented heavy rains in February and March 2011 in Australia flooded the Sunrise Dam Gold Mine and forced a temporary shutdown of operations. The flood event impacted underground production for approximately four months and open pit production for approximately six months. Full costs were incurred despite the shutdown, as the mining contractors worked on remedial activities to repair damage and rehabilitate flooded areas. The considerable remedial work required adversely impacted cash costs per ounce and the impact of the flood event and the pit wall failure together significantly reduced planned production at the plant. In order to prevent recurrences, the operation has undertaken extensive surface drainage mitigation and upgraded its underground pumping and protection system.

3.2

What methodology and what geographical scale (e.g. country, region, watershed, business unit, facility) do you use to analyze water-related risk across your operations?

Risk methodology	Country or geographical scale
<p>There is an ongoing process for identifying, evaluating and managing significant risks and internal controls(including water-related risks of all kinds), and where weaknesses are identified these are promptly addressed as risk mitigation processes are part of the group's overall risk management framework. The group has a sound system of internal control for all identified risks (including water), based on policies and guidelines, in all material subsidiaries and joint ventures under its control. The risk management system has been designed to ensure that the requirements of the South African King Code and the US Sarbanes-Oxley Act are met. In conducting its annual review of the effectiveness of risk management, the board considers the key findings from the ongoing monitoring and reporting process, management assertions and independent assurance reports. The board also takes account of material changes and trends in the risk profile, and considers whether the control system, including reporting, adequately supports the board in achieving its risk management objectives. The board also receives assurance from its Audit and Corporate Governance Committee, which derives its information, in part, from regular internal and external audit reports and, where considered necessary, from other reports on risk and internal control throughout the group. Full reviews of risk control and disclosure processes are undertaken regularly.</p>	Facility

3.3

Do you require your key suppliers to report on their water use, risks and management?

No

3.4

Is your supply chain exposed to water-related risks (current or future) that have the potential to generate a substantive change in your business operation, revenue or expenditure?

Yes

3.4a

Please describe (i) the current and/or future risks to your supply chain, (ii) the ways in which these risks affect or could affect your operations before taking action, (iii) the estimated timescale of these risks and, (iv) your current or proposed strategies for managing them.

Country or geographical reach	Risk type (to supplier)	Potential business impact (to responding company)	Estimate timescale (years)	Risk management strategies (by responding company)
Global	15. Other: Reputational damage	If the company's suppliers (e.g. cyanide supplier) were to pollute water on a large scale, this could raise the company's costs and even affect their ability to survive.	Current	If one of the company's suppliers was affected, there are many alternative suppliers that we could choose from.
Global	07. Regulatory: Increased difficulty in obtaining operations permit	Constrained operations.	11 – 20	We are exploring options for water-neutral technologies. Additionally, we are seeking to find alternative suppliers for potentially affected products and services.
Global	03. Physical: Increased water stress or scarcity	Constrained operations as a result of reduced grid electricity availability.	Current	We are exploring options for securing future energy supplies for our operations and neighbouring communities.

4.1

Has your business experienced any detrimental impacts related to water in the past five years?

Yes

4.1a

Please describe these detrimental impacts including (i) their financial impacts and (ii) whether they have resulted in any changes to company practices.

Detrimental impacts including (i) Financial impacts

Discharge of cyanide and arsenic into the environment led the Ghanaian Environmental Protection Agency (EPA) to issue an Enforcement Notice for the closure of tailings storage facilities for a period of 12 days in 2007 and to an extended Enforcement Notice requiring remediation by June 2008. (This deadline was subsequently extended to June 2009). See the case studies attached below.

Unprecedented heavy rains in February and March 2011 in Australia flooded the Sunrise Dam Gold Mine and forced a temporary shutdown of operations. The flood event impacted underground production for approximately four months and open pit production for approximately six months. Full costs were incurred despite the shutdown, as the mining contractors worked on remedial activities to repair damage and rehabilitate flooded areas. The considerable remedial work required adversely impacted cash costs per ounce and the impact of the flood event and the pit wall failure together significantly reduced planned production at the plant.

Production at the Cripple Creek & Victor Gold Mining Company's Cresson Project continued to be affected by a severe drought in 2011. The lack of water reduced percolation through the heap-leach pad, which curtailed production and productivity.

(ii) Changes to company practices

In Ghana and South Africa there has been a material increase in expenditure on water retention capacity, pollution and supply efforts over the past 5 years. This has resulted in decreased abstraction of raw water, increased reuse of process water, increased separation of 'clean' and 'dirty' water, and better pollution control by treating water before releasing it to public water courses. A case study on some of the South African efforts may be found under attachment (ii) below.

Further Information

Reports:

(i) Case Study

<http://web/Results/Archive/AnnualReport07/ReporttoSociety07/obuasi-environment.htm>

(ii) <http://www.anglogoldashanti.co.za/subwebs/informationforinvestors/reports10/Sustainability/vaal-water-recycling.htm>

5.1

Do water-related issues present opportunities (current or future) that have the potential to generate a substantive change in your business operation, revenue or expenditure?

Yes

5.1a

Please describe (i) the current and/or future opportunities, (ii) the ways in which these opportunities affect or could affect your operations (iii) the estimated timescale and (iv) your current or proposed strategies for exploiting them.

Country or geographical reach	Opportunity type	Potential business impact	Estimated timescale	Strategy to exploit opportunity
Global	Cost savings	Reducing the volume of water consumed has cost advantages as well as improved water security and capital expenditure implications.	Current	There are various projects under way across the company to reuse process water and reduce fresh water consumption.
Global	Other: Improving relationships with local communities	Improved relationships with regulators and communities by improving the quality of water released from operations leading to reduced business disruptions. This may require increases in capital and operating costs required to install infrastructure.	Current	Water treatment capacity has been increased and is being further increased. Additional water containment structures have been installed. As described above, the ability to reuse process water and reduce fresh water consumption is also being improved.
Global	Other: Capacity building	Enhancing the company's reputation through providing assistance, technology and knowledge transfer to communities, resulting in them being able to improve the quality of their available water and sanitation. Where neighbouring communities are able to sustain improved levels of water quality and sanitation, improved living conditions and health are ensured. This has reputational benefits for the company and improved goodwill between the company, regulators and the community. It also results in potentially fewer disruptions by communities to operations in remote areas.	Current	Opportunities to build water supply dams and/or provide water reticulation are evaluated regularly, as are communities' and local governments' capacity to maintain them in the long term.

6.1

Has your company identified any linkages or trade-offs between water and carbon emissions in its operations or supply chain?

Yes

6.1a

Please describe the linkages or trade-offs and the related management policy or action.

Linkage or trade-off	Policy or action
<p>Linkage: In South Africa, pumping water from deep underground mines which ingresses to the workings via cracks and fissures from higher aquifers requires considerable electrical energy. More than 90% of South Africa's grid electricity is generated from coal and the country has one of the world's highest emissions factors.</p>	<p>For several years, the South African operations have had in place a load shifting management process to phase evacuation pumping, as far as practicable, outside of peak electricity demand periods. In addition, where technically feasible, grouting of the major inflow pathways of aquifer water ingress into underground workings is undertaken.</p>
<p>Linkages: Ice storage- South Africa: The implementation of this project not only reduces electricity (and therefore carbon emissions) but also water usage is reduced.</p>	<p>To assist with the peak demand periods that the local electricity supplier Eskom experiences, AngloGold Ashanti implemented an ice storage unit at Moab Khotsong mine. This is then used to switch off fridge plants during the evening peaks of 18h00 to 20h00. Through the implementation of this project both electrical energy (and therefore carbon emissions) and water usage are reduced.</p>

7.1

Are you able to provide data, whether measured or estimated, on water withdrawals within your operations?

Yes

7.1a

Please report the water withdrawals within your operations for the reporting year.

Country or geographical reach	Withdrawal type	Quantity (megaliters/year)	Proportion of data that has been verified (%)	Comments
Argentina	Groundwater	939	76-100	
Australia	Other: Surface water & groundwater + water utility. + water utility.	4198	76-100	
Brazil	Other: Surfacewater & groundwater	3603	76-100	Surface water not used at Serra Grande.
Ghana	Other: Surfacewater & groundwater	8976	76-100	Surface water not used at Iduapriem.
Guinea	Other: Surfacewater & groundwater	6097	76-100	
Mali	Other: Surfacewater & groundwater	7028	76-100	Surface water only used at Sadiola. Yatela only uses groundwater.
Namibia	Municipal water	1043	76-100	
South Africa	Other: Surfacewater, groundwater & municipal water	18821	76-100	A minor amount of wastewater is imported from a third party in South Africa. This is included in the municipal water intake and typically accounts for approximately 1% of the municipal water volume. No surface water is used at West Wits.
Tanzania	Surface	3970	76-100	
United States of America	Municipal water	2207	76-100	

7.2

Are you able to provide data, whether measured or estimated, on water recycling/reuse within your operations?

No

7.2b

Please explain why you are not able to provide data for water recycling/reuse within your operations.

AngloGold Ashanti believes this indicator is a useful water use performance metric indicator and has since 2009 developed common definitions on which to base calculations. There are significant volumes of water recycled in the mining and metallurgical processing operations of the company, and calculating these volumes comprehensively and accurately is a complex task, which will be an area of focus during 2012.

7.3

Please use this space to describe the methodologies used for questions 7.1 and 7.2 or to report withdrawals or recycling/reuse in a different format to that set out above.

AngloGold Ashanti operations have functional water balances focussed on production activities and infrastructure. Although rainfall levels are not commonly accounted for on an ongoing basis the water inventory effects of rainfall are accounted for.

7.4

Are any water sources significantly affected by your company's withdrawal of water?

No

7.4b

You may explain here why your company's withdrawal of water does not significantly affect any water sources.

AngloGold Ashanti's operations utilise water under host country licence arrangements, or directly from utilities. Those licences are typically the culmination of extensive studies into the carrying capacities of water supply systems or sources, whereafter limits are typically imposed to which the company works (e.g. maximum annual abstraction limits from groundwater). This ensures that the offtake volumes are well within the aquifer or river carrying capacity. The system not only ensures that other users and the environment are not detrimentally affected, but also that a sustainable supply is available for the continued production operations for the life of mine.

8.1

Are you able to identify discharges of water from your operations by destination, by treatment method and by quality using standard effluent parameters?

Yes

8.2

Did your company pay any penalties or fines for significant breaches of discharge agreements or regulations in the reporting period?

No

8.3

Are any water bodies and related habitats significantly affected by discharges of water or runoff from your operations?

Yes

8.3a

Please list any water bodies and associated habitats which are significantly affected by discharge of water or runoff from your operations.

Country or geographical reach	Water body	Impact	Company action and outcomes
Ghana	Watercourses downstream of Iduapriem and Obuasi mines.	Contamination of watercourses and habitats situated downstream of	During 2010, the water treatment plant at Iduapriem installed in 2009 was upgraded with the addition of a reverse osmosis plant. The work was undertaken to meet discharge standards. During 2010 and 2011, additional water treatment capacity was installed (and continues to be installed) at Obuasi mine. This includes Actiflow and reverse osmosis treatment facilities to ensure that discharge standards are met at all

Country or geographical reach	Water body	Impact	Company action and outcomes
		Iduapriem and Obuasi mines due to their discharges.	times.
South Africa	Surface (Vaal River area) and groundwater	Surface and groundwater contamination due to seepage from mining activities.	Polluted groundwater is intercepted before it can enter the Vaal River - see the case study 8.3a (i) attached in "Further Information" below; A long-running research programme enables the company to use specially adapted plants to withdraw water and dissolved salts to the surface. See the case study 8.3a (ii) in "Further Information" below; Technologies and processes that minimise raw water intake are being introduced, and the company is progressively optimising the recycling of process water. http://www.anglogoldashanti.co.za/subwebs/informationforinvestors/reports10/Sustainability/vaal-water-recycling.htm

Further Information

8.3a Case Study (i)

<http://www.anglogoldashanti.co.za/subwebs/informationforinvestors/reports10/Sustainability/vaal-water-recycling.htm>

8.3a Case Study (ii)

<http://www.anglogoldashanti.co.za/subwebs/InformationForInvestors/Reports08/phyto-remediation.htm>

9.1

Please provide any available financial intensity values for your company's water use across its operations.

Country or geographical region	Financial metric	Water use type (megaliters)	Currency	Financial intensity (Currency/mega-liter)	Please provide any contextual details that you consider relevant to understand the units or figures you have provided.
Australia	Revenue	Withdrawals	USD(\$)	94900	Measurement of financial intensity is with respect to all types of sourced water at region (ground, surface, or utility water). The intensity figures given are solely for regions that encounter water-related risks or stresses.
Namibia	Revenue	Withdrawals	USD(\$)	99700	Measurement of financial intensity is with respect to all types of sourced water at region (ground, surface, or utility water). The intensity figures given are solely for regions that encounter water-related risks or stresses.
South Africa	Revenue	Withdrawals	USD(\$)	136000	Measurement of financial intensity is with respect to all types of sourced water at region (ground, surface, or utility water). The intensity figures given are solely for regions that encounter water-related risks or stresses.
United States of America	Revenue	Withdrawals	USD(\$)	192000	Measurement of financial intensity is with respect to all types of sourced water at region (ground, surface, or utility water). The intensity figures given are solely for regions that encounter water-related risks or stresses.
Ghana	Revenue	Withdrawals	USD(\$)	89200	Measurement of financial intensity is with respect to all types of sourced water at region (ground, surface, or utility water). The intensity figures given are solely for regions that encounter water-related risks or stresses.
Mali	Revenue	Withdrawals	USD(\$)	82000	Measurement of financial intensity is with respect to all types of sourced water at region (ground, surface, or utility water). The intensity figures given are solely for regions that encounter water-related risks or stresses.

9.2

Please provide any available water intensity values for your company's products across its operations.

Country or geographical region	Product	Product unit	Water unit	Water intensity (Water unit/product unit)	Water use type	Please provide any contextual details that you consider relevant to understand the units or figures you have provided.
Argentina	Gold	Other: Ounce of gold produced	Other: Kilolitres	4.4	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
Australia	Gold	Other: Ounce of gold produced	Other: Kilolitres	16.5	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
Brazil	Gold	Other: Ounce of gold produced	Other: Kilolitres	7.3	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
Ghana	Gold	Other: Ounce of gold produced	Other: Kilolitres	17.5	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
Guinea	Gold	Other: Ounce of gold produced	Other: Kilolitres	7.1	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
Mali	Gold	Other: Ounce of gold produced	Other: Kilolitres	2.6	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
Namibia	Gold	Other: Ounce of gold produced	Other: Kilolitres	15.8	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
South Africa	Gold	Other: Ounce of gold produced	Other: Kilolitres	3.2	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
Tanzania	Gold	Other: Ounce of gold produced	Other: Kilolitres	8.0	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.
United States of America	Gold	Other: Ounce of gold produced	Other: Kilolitres	8.3	Withdrawals	Direct water use– includes all types of water used in the whole process to produce an ounce of gold.

Further Information

It is not feasible to benchmark or compare water consumption intensity across the different countries or between operations because there are typically great differences in mining and metallurgical processing designs. For example, some mines are underground operations, requiring greater water volumes (used in cooling circuits), while others are open pit mines that have very different design and inherently different water usage requirements.

Furthermore, the different types of metallurgical processes employed result in different patterns of water use. For example, heap leach operations have different water use patterns to conventional milling and tailings deposition circuits.