

## STATEMENT BY THE GROUND WATER DIVISION: 20 JUNE 2016 Water in South Africa – is groundwater an option?

Water scarcity, droughts and issues around potable water are frequent in the mass media. In the shadows of the concerns in the news, social media are abuzz with finger-pointing as to what the reasons are for water scarcity in South Africa.

In many instances, the issues can be solved by our water professionals, provided that we can get past the general misconception that South Africa has no water. Yes, South Africa is water scarce, and yes, water needs to be imported vast distances for supply, most notably to the urban areas. But in many areas of South Africa, groundwater is a vastly underrated source of water, which can possibly ameliorate many of the ever growing demands.

Proper qualified, professional practicing geohydrologists or hydrogeologists (the terms are used interchangeably) are responsible for the characterisation of subsurface waters. When characterising groundwater, we aim to consider both the water quantity and its quality. In terms of the quantity of water, knowledge is applied to studying the movement of water and the design of water supply schemes. Regarding the quality of water, on the other hand, one considers whether the water can be used without adverse effects to people or the environment, as well as to solve problems related to pollution.

Groundwater scientists have the knowledge and skill to address groundwater as a source for water supply in specific areas. Knowledge about geology teaches us about the water-bearing properties of rocks, and when sufficiently high, we term these aquifers. Our understanding of fluid mechanics and chemistry allow us to determine flow rates, the composition of water and rates at which it can be pumped to supply water without any permanent damage to the aquifer. And few people are better equipped to outline the management plan for the use of this very valuable resource.

Now is not the time to shy away from using groundwater, but rather the time to emphasise that we can tap into this resource, provided that we use the very special skill set of our country's highly competent hydrogeologists and geohydrologists. Groundwater is more abundant than surface water – undoubtedly so – but, as with surface water, its occurrence and quality are highly variable. Specialist input is required, and, as the groundwater professionals of South Africa, we urge all to abide by the law and ensure that this resource is used sustainably.

This message is released by the Ground Water Division. If you enquire further information about us, please visit our website at <a href="https://www.gwd.org.za">www.gwd.org.za</a>.



## CALL FOR INTEREST: 20 JUNE 2016 Groundwater Investigation – Requirements and Competency

The Ground Water Division (GWD) of the Geological Society of South Africa (GSSA) represents South Africa's groundwater professionals. Together with our international counterpart, the International Association of Hydrogeologists (IAH), we aim to promote ethical conduct in groundwater science and to inform stakeholders about correct procedure.

We are planning to host a roadshow (expected to be one hour each followed by a discussion session) with environmental practitioners, town planners, engineers, decision-makers and other specialist consultants. The purpose of the session will be to:

- 1. Advice on the procurement of services for geohydrological or hydrogeological investigations
- 2. Inform about minimum requirements of such reports for environmental impact assessments (EIA), water use license applications (WULA) and other specialist requirements
- 3. Provide context to the available governing legislation, standards and best practice guidelines available.

As a society affected by these decisions, we are enquiring about your interest to attend, endorse and/ or accredit such a course. As our intention is to offer this at essentially no cost (depending on institutional support), we depend on collaboration with other professional bodies and societies to promote and advocate this important session.

Your interest in this matter will be greatly appreciated. Kindly communicate your thoughts to our secretariat at <a href="mailto:info@gwd.org.za">info@gwd.org.za</a> under the subject **Groundwater Investigation Roadshow**.

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