

September 2021 #RGSSolidGround 18 YEARS DRILLING & ADVICE

REGULAR NEWS AND VIEWS FROM ROGERS GEOTECHNICAL SERVICES



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Our regular newsletter celebrates 18 years of drilling and keeps you up to date with RGS and industry news.

Rogers Geotechnical Services Ltd are site investigation specialists offering ground investigation and geotechnical services to developers, builders, structural and consulting engineers, architects, insurance companies, local authorities, piling and foundation engineers, private individuals and other geotechnical consultants.



RESHAPING OUR TEAMS: WELCOME, LEWIS!

In last month's edition of Insite, we announced that we're developing a dedicated Project Management Team. This significant initiative will not only free up more time for our engineers but, most importantly, will also give every client a highly effective single point of contact throughout their project.

We're now delighted to welcome a new **Project Manager** to the team **Lewis Scarboro**. Since gaining a **BSc in Geology and a MSC in Geoscience at Derby University**, Lewis has accumulated several years' experience in the field, most recently in managing a large geotechnical laboratory. Armed with his impressive knowledge and skills, he's excited at the opportunity to add real value for RGS clients, and explains that RGS's friendly and collaborative team approach is a breath of fresh air.



Here, we all share ideas and skills to make every project the best it can be," says Lewis. "The firm is large enough to take on projects of all sizes, but small enough to value every team member's contribution. There's a clear commitment to developing each individual's professional skills and ambitions. Right now, I'm doing the job I most wanted to do, but the prospect of being able to progress my career here at RGS is also hugely motivating.

Lewis is already enjoying his new and busy role and looks forward to getting to know our amazing clients in the months and years ahead.



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CONTRUCTION HAZARDS

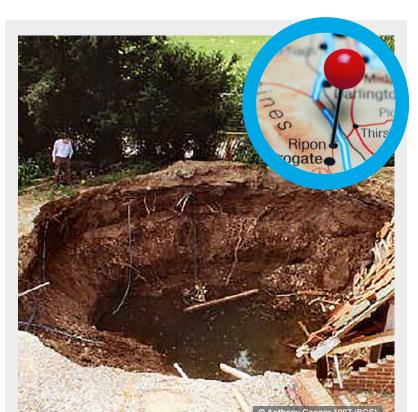
RGS's Gypsum King!



unseen beneath the soil's surface within mudstone strata, sometimes in extensive seams, and crucially, it's highly soluble in

water. The dissolution rate, which increases significantly in both sulphur-poor water and in mobile water, can be up to 100 times faster than limestone.





Under certain geological conditions, this rapid dissolution of gypsum in mobile water results in the formation of rapidly expanding cave systems which can cause catastrophic subsidence (sinkholes) at the surface.

(If you're in any doubt about the gypsum under your site, our specialist geological teams can determine the risk and advise whether or not remedial action is needed).

Ripon is a particular gypsum hotspot, lying within an extensive seam that stretches from Darlington in the north and southwards to South Derbyshire and Nottinghamshire. Indeed, Ripon has a long history of sinkholes, which happen on average once a year. They occur more commonly in rural areas, but when they do strike in urban districts, the results can be devastating.

SINKHOLE ALERT!

Sinkholes occur not only in GYPSUM deposits, but also in

CHALK LIMESTONE DOLOMITE

and above ABANDONED

COAL MINE WORKINGS

See 'Protecting your site' below

Scott's thorough presentation delved deeper into the nature of gypsum sinkholes and how to protect against the hazards they present, strategies which include Phase One Desk Studies with a Geological Hazards Risk Assessment and geophysical surveys, followed by specialist design of foundations, roads, pavements and utility infrastructure.

ARE YOU CONCERNED ABOUT POTENTIAL GYPSUM DEPOSITS OR SINKHOLE RISKS?

DON'T HESITATE TO CALL OUR EXPERT TEAM ON 01484 604354
WE'LL GIVE YOU ALL THE ADVICE AND SUPPORT YOU NEED.

Environmental
Geotechnical
Specialists

RGS

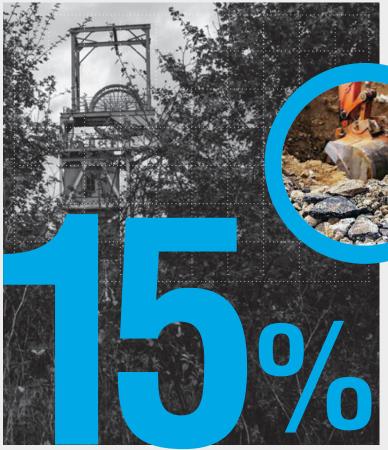


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CLIENT RESOURCES

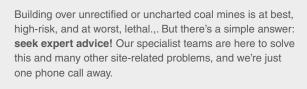
Protecting your site from coal risks:

a handy guide



Across the UK, coal mining activities past and present pose significant risks to construction projects. In fact, 15% of the 40 coal field areas are designated as Development High Risk Areas, indicating that there are coal mining risks to construction at or close to the surface.

What's more, mine owners were only required to log their mining plans and activities following the Coal Mines Regulation Act of 1872. Therefore, those mineworkings which predate this legislation (and indeed some which came later) remain hidden and unrecorded.









Meanwhile, if you'd like to learn more about the widespread impact of coal workings on construction, **click here!**

Coal Mining and Construction: How to Manage the Risk

written by RGS **Geoenvironmental Engineer**, **Charlotte Mason**, offers a valuable summary of information and guidance on the topic.

DO YOU HAVE CONCERNS OR QUESTIONS ABOUT THE IMPACT OF COAL WORKINGS ON YOUR SITE?

DON'T HESITATE TO CALL US FOR ADVICE ON 01484 604354

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THE ROGERS ARCHIVE

Granny Rogers' Musings: Episode 10

Sod's Second Law of Complexity



Back in the early 80s, I was working for the Department of Works in Papua New Guinea, researching coronous, a material that was hitherto unfamiliar to me. A country of immense biological diversity, Papua New Guinea is famed for its raised 'coronus' coral reefs.

The region suffers from a shortage of standard engineering aggregates, but the corounous material derived from old reefs can be used to create very good pavements. Indeed, during the World War 2, the US military used the coronous to construct a large airport at Momote, at the eastern end of Manus Island, which is still in use (and visible on Google Earth).

Their compacted coronous was much wetter than optimum and it appeared to self-cement, forming a concrete-like runway.



What had happened here? Despite my research, I couldn't pin down the mechanism of the apparent self-cementation for sure. However, before completing my research I returned to the UK on leave and had the chance to discuss my findings with Granny Rogers.





I sat for a while, hoping that she'd explain.

Rapidly picking up an Amaretti biscuit (one of her favourite treats), she said "You see, if there's more than one possible solution, you can bet your life that there's an element of truth in each!"

We both sat quietly, watching the sunset and I realised that I should not be trying to fit a single theory into a multi-functional problem.

Over the years I've often considered **Sod's Second Law of Complexity**, and it's helped me to understand many a thorny problem!

Steve Rogers





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For more information about your investigation requirements please don't hesitate to contact us.

Telephone on 01484 604 354

Click here to email us

CLIENT FEEDBACK

Talk to us

The RGS team has been brilliant: their service is seamless and efficient. We'll definitely use them again!

We're always keen to hear what clients think of our service and welcome feedback from our clients, colleagues and associates.

We're looking forward to hearing from YOU!

Click here to email us your comments.

Environmental Geotechnical **Specialists**



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