Geo-communications

Communicating Earth Science, MGeol, Plymouth University
Wednesday 20th November 2013

Clive Mitchell
Head of Corporate Communications & Publications
British Geological Survey
In the next 2 hours....

- What makes ‘news’ newsworthy
- The ‘So what’ factor
- Understanding the media
- Press releases
- Press conferences
- Broadcast media
- Use of the web
- Social media
- Science festivals & public engagement
- Media monitoring
My background...

• Industrial minerals geologist for nearly 25 years at BGS, mainly overseas (Africa, Middle East, Afghanistan…)
• As an applied scientist I’ve been communicating with clients/ funders for years (& they still give me money!)
• My involvement with the BGS Press Office began in 2007 with a Central TV weather forecast from the BGS Christmas carol concert!
BGS Press Office

• The BGS Press Office is part of the Communications team which is also responsible for web delivery, outreach, internal comms and publications.

• The Press Office aims to create the maximum impact for BGS science via the media.

• We do this with press releases, press conferences & briefings, media interviews, web content, social media and videos.
So you think its *newsworthy*...?

- Remember news is – **new, unusual, interesting** - apply this test to your own research / work and ask:
  
  *How would this affect people?*
  
  *Would anyone else be interested?*
  
  *Is it all just a big ‘So what’?*

- Issues that affect large numbers of people generally attract media interest e.g. earthquakes, volcanic eruptions & groundwater shortages

- Other factors include: human interest, connection to current news, links to famous people/ events, superlatives, cute animals etc...
Top BGS news stories in 2013

1. Earthquakes
2. Landslides
3. Shale gas
4. Fossils
5. Groundwater/ flooding
6. Geothermal
7. Carbon Capture and Storage (CCS)
8. Space weather and geomagnetism
9. Archaeological dating
10. Volcanic eruptions and ash
'Average' quake hits East Midlands

BGS seismologists interpret the Loughborough earthquake, 18th Jan 2013
Weather: Landslide Alert Amid Floods And Rain

The Met Office warns all areas with heavy rain are at risk of landslides and urges Boxing Day walkers to take extra care.

A landslide warning has been issued by the Met Office, as continued heavy downpours sparked fears of unstable cliff faces.

Boxing Day walkers were urged to take extra care in "dangerous conditions" with flooding slightly more prevalent in parts of England and Wales in the lead-up to Christmas Day.
UK shale gas resources 'greater than thought'

UK shale gas resources may be far greater than previously thought, a report for the government says.

The British Geological Survey estimates there may be 1,300 trillion cubic feet of shale gas present in the north of England - double previous estimates.

Meanwhile the government has announced measures to enable shale gas drilling as part of its infrastructure plans.
Fossil finds in Leicestershire 'absolutely world class'

This cast shows two of the newly-found fossils

Geologists say thousands more fossils exist at a Leicestershire site than previously realised.

The fossils, which are almost impossible to see with the naked eye, were found at Charnwood Forest.
Going up - Elevator pitch

• Can you explain your science, using layman's terms, in the short time spent in an elevator?
• This is good practice for media interviews – you have 30 seconds ... harder than it sounds!
• Every scientist should be able to explain their scientific research to any audience
• Lets have a go……..
As an idea, pitch this........

• Your most recent Geo-Comm Blog
• Your Urban Geologist project idea(s)
• Your argument for or against shale gas exploitation
• Your argument for or against Nuclear Power
• Your argument for or against mineral resource exploitation in the UK
• Robotic mining of the sea floor
• Mining of the asteroid belt
• The future of geological mapping / maps
• The value of geology on the TV
Understanding the media

• Surprisingly, journalists are people too!
• They are after a NEW science story with impact.
• They are not your friend although mostly friendly.
• Deadlines rule – they won’t wait while you dither!
• Be honest (to a point) – if you don’t know say so.
• Don’t be afraid to contact them – but don’t hassle!
• Stick to what you know.
• Follow them on twitter – retweet & message occasionally
National journalists

BBC - David Shukman, Jonathan Amos, Matt McGrath, John Moylan, Tom Feilden, Pallab Ghosh
Channel 4 News – Tom Clarke
Daily Mail – Nick McDermott
Daily Telegraph – Richard Gray
Financial Times – Clive Cookson
Freelance – David Derbyshire
Guardian – Alok Jha, Ian Sample, James Randerson
Independent – Steve Connor
Irish Times – Dick Ahlstrom
Observer – Robin McKie
The Sun – Ben Jackson
Sunday Times – Jonathan Leake
The Times – Tom Whipple, Ben Webster, Hannah Devlin
Press releases

• The sole purpose of a press release is to get the interest of a journalist
• It must be clear, immediate and relevant
• The title is crucial
• The 5 W’s – Who, What, Where, When & Why
• Key messages
• Pictures may serve the same purpose
• Sometimes a telephone call or email may do the trick instead
Press release exercise

• Have a look at the text provided
• We need a snappy title for the press release
• This is the first, and possibly only, thing a journalist will see
• You need to grab his attention so he opens rather than deletes the email
• OK ideas ……
PRESS RELEASE

16th May 2012

Let’s do the time walk at the British Geological Survey

Three billion years of Earth’s history squeezed into a 130-metre-long stone concourse, every step bringing you 25 million years closer to the present day. The new Geological Walk at the British Geological Survey (BGS), one of the Natural Environment Research Council’s research centres, is part of a recently completed redevelopment. The new development includes a new eco-friendly office for BGS scientists and support staff, reception and conference facility. The UK Government Chief Scientist, Sir John Beddington is officially opening the new development on 17th May 2012.
A picture speaks a thousand words

Volcanic ash plume from the eruption of the Eyjafjallajokull volcano, Iceland, April 2010
Volcanic ash particle from the eruption of the Eyjafjallajokull volcano, Iceland, April 2010
Press conferences

• Typically for the big stories or events
• Science Media Centre (SMC)
  e.g. Shale Gas (seismic mitigation; resources; background briefings); London Earth Science Festival
  e.g. Critical Metals; Earthquakes; Space Weather; Geothermal energy
PRESS CONFERENCE: British Science Festival, Aberdeen 2012
Broadcast media

• Are you a TV star?
• Or do you have a face for Radio?
• Live or pre-recorded? Live everytime!
LIVE INTERVIEW: Nick Higham interviewing Andrew Bloodworth at BSF 2011
BGS comms team advice…..

• Work with your press office
• Interviews – be available, take your press officer, don’t forget to breathe, don’t look at the camera and be yourself
• Stick to what you know, keep it short and simple, (avoid jargon) and spell out your organisation name in full, repeat it and check it is credited correctly
Quiz time……

1. Earthquakes – how is the size expressed?
   a) Magnitude
   b) Richter Scale
   c) Megatons

2. Landslides – what has caused increase in last 18 months?
   a) Dry winters
   b) Above average rainfall
   c) Earthquakes

3. Shale gas – who is Ed Davey?
   a) BGS Director of Science for Energy
   b) Frack Off protestor
   c) Government Secretary of State for Energy and Climate Change

4. CCS – what does this mean?
   a) Carbon Capture & Storage
   b) CO\(_2\) Capture & Storage
   c) Carbonate Combustion & Sequestration

5. Sinkholes – what are they?
   a) Limestone caves in Thailand, locally known as 'Sin Khole'
   b) Manmade excavations used for waste disposal
   c) Cavities caused by dissolution often leading to ground collapse

6. Radon – a big issue in the SW, where does it come from?
   a) Naturally occurring reservoirs of gas
   b) Radioactive decay of uranium found in rocks such as granite
   c) As a byproduct of the hydraulic mining of kaolin

7. Shale gas – resources are measured in TCF, what is that?
   a) Trillion Cubic Feet
   b) Thousand Cubic Feet
   c) Tonnes per Cubic Foot

8. Government – who is David Willets?
   a) Secretary of State for Business, Innovation and Skills
   b) Minister of State for Business and Energy
   c) Minister of State for Universities and Science

9. Nuclear Energy – what is the NDA?
   a) National Development Agency
   b) Nuclear Decommissioning Authority
   c) Nuclear Development Authority

10. Iceland – which volcano caused disruption in 2010?
    a) Grímsvötn (Grims-vert-n)
    b) Popocatepetl (Pop-o-cat-a-petal)
    c) Eyjafjallajökull (Aya-fee-yat-la-yur-kurch)
Web

- BGS News Room
- BGS in the Media
- Press Releases
- Research News & Awards
- Newsletter
- Highlights – our web editor creates web pages for every ‘story’ and continually updates them
- Videos
  e.g. Tungsten – Cutting Edge and Critical
  http://www.youtube.com/watch?v=8b1LgVNq1Jk
To tweet or not to tweet?

• Whether or not to use social media is a dilemma - banning its use is not a solution, it’s a missed opportunity

• In my opinion, its fine but remember to moderate your choice of words to suit a wider audience

• Practice this four word social media policy:

Act Like A Grownup

and follow me on Twitter! @CliveBGS
Clive Mitchell
@CliveBGS
Chairman @EIGConferenc
real Ale brewer. YouTube/CliveJM.
Views expressed are my own.
Nottingham, UK - bgs.ac.uk/staff/profiles...

1,523
TWEETS
834
FOLLOWING
659
FOLLOWERS

Tweets

Metalbanker @Metalbanker
#Cerium Nano-sized Electron Sponge Uncovered Using X-rays:
Retweeted by Clive Mitchell

Clive Mitchell @CliveBGS
Groundwater forecasting now available monthly from
@BritGeoSurvey via Hydrological Outlook hydoutuk.net
pic.twitter.com/VRM1vqPPJ

November river flows are most likely to be normal in
eastern Britain and parts of the south.

November river flows are likely to be above normal in
the next six months or more in some
northern boreholes.
BGS Social Media Guidance

• Use of personal social media is permitted to communicate BGS science/information
• Follow the NERC code of conduct:
  • Integrity, honesty, objectivity and impartiality
  • Avoid Government policies, practices and controversial issues, and avoid personal attacks and politics
  • Check accuracy & sensitivity, use common sense, if unsure seek advice or don’t post
  • Postings considered inappropriate may result in disciplinary action
Science Festivals

- Cheltenham Science Festival (June)
- Royal Society Summer Science Exhibition (July)
- British Science Festival (September)
- Ideas for future events?
Outreach / Public Engagement

• National Science & Engineering Week (NSEW)
• Open Days at Keyworth & Edinburgh sites
• Discovering Geology
• School Seismology project
• BGS Keyworth site tours including geological walk
BGS Press Officer keeping an eye on Keyworth Open Day 2013
Tsunami wall demonstration, Murchison House Open Day 2013
How to keep track....

- **Cision** is an online monitoring service we use that keeps track of the BGS in print, broadcast and online media.
- You can set up your own free media monitoring using **Google Alerts** (www.google.com/alerts) – this can be set up to email you as stories emerge.
- Keep a record of ‘hits’ and web links where available.
Outlet: Daily Telegraph
Title/programme: Fracking 'is safe... and it's coming soon'; We're tackling fracking myths, says minister
Media Group: Print
Media Type: Daily Newspaper
Publication Date: 09/11/2013
Extract: ... been concentrated in the North, but Mr Fallon said the South could also be in line for fracking. Next year, the British Geological Survey will publish a map of the "southern basin" of England, identifying sites most ...

Outlet: ENERGY LIVE NEWS
Title/programme: Shale gas is ‘saving the planet from coal’
Media Group: Internet
Media Type: News Web Sites
Publication Date: 09/11/2013
Extract: ... If I can extract 10% of that and the British Geological Survey says the same thing, we can power the UK for 50 years.

Outlet: Telegraph
Title/programme: Fracking 'is safe... and it's coming soon'
Media Group: Internet
Media Type: Online Print Version
Publication Date: 08/11/2013
Extract: for fracking. Next year, the British Geological Survey will publish a map of the "southern basin" of England, identify
Fracking 'is safe' .. and it's coming soon
Telegraph.co.uk - Nov 9, 2013
Mr Fallon said its report will conclude that fracking is largely safe, and will say there is no risk of contamination of water supplies. The report will be part of a drive by the Government to dispel fears about shale gas, which have led to protests against energy ...

Water report 'says fracking is safe'
BBC News - Nov 9, 2013
A study by the water industry has concluded that "fracking" to extract shale gas is safe, the government says. Opponents say water used in the process could be contaminated and could enter domestic supplies. UK Water Industry Research, a research body ...

Minister's vow on fracking 'myths'
Belfast Telegraph - Nov 9, 2013
... safe and affordable energy system, based on cutting energy waste and developing Britain's abundant renewable power potential." A recent report by Public Health England said an initial review suggested the risks to people's health from fracking were low ...

Prepare for fracking, UK minister tells Southern England
RT (blog) - Nov 11, 2013
Michael Fallon said that a study by the water industry, due to be released in a few weeks, will conclude that fracking is safe. Fallon, a conservative minister, who has posts in the business and energy departments, which might be why he knows the results of ...

British minister says fracking is safe, and coming soon
UPI.com - Nov 9, 2013
LONDON, Nov. 9 (UPI) -- A British government minister says "there are genuine concerns" but shale gas fracking is safe and will come soon, possibly throughout England. Michael Fallon -- minister of state in the Department of Energy and Climate Change ...

There mustn't be a north / south divide when it comes to fracking
Spectator.co.uk (blog) - Nov 9, 2013
Despite all the scaremongering, fracking is as safe as any other form of energy extraction. Fallon tells the Telegraph that Water UK is soon to say that it won't contaminate water supplies. Given all this, the sooner this country gets fracking, the better.

Has your area been identified for fracking?
Burnley Express - Nov 9, 2013
In addition, essential water supplies could easily be contaminated at source while vast volumes of fracking fluid is pumped into the ground. This could result in millions of gallons of water being contaminated every day.
When a big story breaks…

• Twitter is often first to tell us a story is breaking, usually an earthquake
• Next the phone starts ringing off the hook, typically starting mid-morning & slows down mid-afternoon
• All day it’s a scramble to find scientists (& get them to talk), keep track and cover all requests
• Email alerts from our online monitoring service start piling up in my inbox
• Often it lasts for several days gradually tailing off
Recommended reference

Most of what I have told you (and much more) is covered in the book, 

**Brilliant PR**

by Cathy Bussey 
(deputy editor of PRWeek magazine)
Where can I get training…..

• **Introduction to the News Media**
  Run by the Science Media Centre, ½ day session with real journalists, FREE!

• **Media Fellowships**
  British Science Association scheme, 3-6 weeks working with the media, 10 per year.

• **STEM Ambassador**
  Science, Technology, Engineering & Mathematics Network (STEMNET)
Key take home messages…

- Science stories have to be interesting
- Stick to what you know
- Be brave, take the plunge, it’s worthwhile and fun!
Thank you for your attention

Clive Mitchell
Head of Corporate Communications & Publications
British Geological Survey
Keyworth, Nottingham, NG12 5GG
United Kingdom (UK)
Tel. +44 (0)115 936 3257
Email: cjmi@bgs.ac.uk
Web: www.mineralsuk.com
Twitter: @CliveBGS