OTM-073: Identifying sources of building resources

Identifying sources of building resources

Challenge

	Challenge ID	OTM:073				
1	Title	Identifying sources of building resources				
2	Theme ID	ON 5.3: Logistics planning and operations - Facility siting, pipeline routing and roads development				
3	Originator of Challenge	Onshore: OTM				
4	Challenge Reviewer / initiator	DFID				
	General description	Overview of Challenge				
5	What is the nature of the challenge? (What is not adequately addressed at present?)	Getting building resources (such as gravel and aggregate) to site can be very expensive and complicated, this is especially the case in countries with security problems, such as South Sudan, which also has the problem of being landlocked. The location of infrastructure, from roads to bases, is heavily influenced by the location of these resources - if we could identify what the options are we could better plan our infrastructure locations/routes. We could also save significant costs, and reduce the risks from transporting resources.				
6	Thematic information requirements	1. Obtain detailed topographic information, 2. Obtain detailed terrain characterisation, 11. Determine lithology, mineralogy and structural properties of the near surface, 14. Obtain detailed imagery of the surface,				
7	Nature of the challenge - What effect does this challenge have on operations?	The ultimate locations for infrastructure could be improved, and development costs could be vastly reduced if these sites can be better identified.				
8	What do you currently do to address this challenge?/ How is this challenge conventionally addressed?	Aerial photography, but this only covers a small area. This is followed up by on the ground surveying				
9	What kind of solution do you envisage could address this challenge?	Detailed satellite mapping which identifies potential quarry sites				
10	What is your view on the capability of technology to meet this need? – are you currently using EO tech? If not, why not?	EO could be a useful complimentary technology.				
	Challenge classification					
11	Lifecycle stage	Pre license	Exp.	Dev.	Prod.	Decom.
	Score from impact quantification [1]	4	4	2	1	1
12	Climate classification	NOT CLIMATE SPECIFIC				
13	Geographic context/restrictions	Generic onshore (Unspecified)				
14	Topographic classification / Offshore classification	Generic onshore (Unspecified)				
15	Seasonal variations	Any season				
16	Impact Area	Development costs				
17	Technology Urgency (How quickly does the user need the solution)	Immediately (0-2 years)				
	Information requirements					
18	Update frequency	Not important				
19	Data Currently used					
20	Spatial resolution					
21	Thematic accuracy					
22	Example formats					
23	Timeliness	Reference data - timeliness not important				
24	Geographic Extent	District area				
25	Existing standards					

[1] Impact quantification scores: *4 – Critical/ enabling; 3 – Significant/ competitive advantage; 2 – Important but non-essential; 1 – Nice to have; 0 – No impact, need satisfied with existing technology*

Relevant products

Content by label

There is no content with the specified labels