

Editorial

This year sees a refocused strategy for the Industrial Sector at World Gold Council. Our overall objective, as ever, is to stimulate and sustain demand for gold from industrial end users. However, higher gold prices and the emergence of supposedly lower cost substitutes have required the WGC to reshape its programmes. Specifically there is a need to be more active in protecting the most significant source of industrial demand for gold; in the electronics industry.

The economic downturn hit immediate demand for gold from this sector, but more seriously in the longer-term gold faces tough competition from alternative 'cheaper' materials. A good example of this is the emerging use of copper bonding wire in semiconductor packaging, at the expense of gold wire. With the rising price of gold, many companies are looking to save costs. They are looking to switch to base metals like copper, particularly for high volume products with low margins, where reliability is not a concern. For example in China, there has been a switch for high volume, low margin products such as toys.

The WGC has just completed the first global study of the semiconductor industry into views of the use of the different wire types. The key finding of the report is that the semiconductor industry has serious reservations about the reliability and yield of copper wire bonded chips. The survey also showed that an increasing number of companies are considering using copper for some new products despite evidence that gold is more reliable. So there is a challenge to gold's position as the material of choice.

To contribute to the 'gold versus copper' debate, the WGC is currently undertaking research to look into the scientific reasons for the differences in reliability and performance between gold and copper wire bonding. The results of this research will be published later in the year, which leads me neatly onto the question – where does the publication of *Gold Bulletin* fit into the refocused strategy I mentioned in the first paragraph? Well, I'm glad to report that the publication of *Gold Bulletin* will remain a key part of the WGC's programme in 2010. As before the aim is to promote new science and applications as they relate to gold and we will also include an increased number of high quality peer reviewed papers relating to the use of gold in electronics. Volume 43, Issue 3 will be a special issue of the journal, dedicated to the use of gold in the electronics industry. Dissemination of such information through the journal is a key means to assist electronic industry end-users make best use of the metal in the future.



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By the way, before the publication of the next issue of Gold Bulletin (43, 2) we will be introducing a new system of advanced online publication for papers. Please check the journal website www.goldbulletin.org for more on this initiative.