

2<sup>nd</sup> Global Summit on

# RECYCLING AND WASTE MANAGEMENT

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## **Nano technology for the manufacture of affordable housing, furniture and irrigation products from EOL waste tyres**

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**D**ENA Family of Companies was established over 28 years ago in 1990 by Dr. Brian Sulaiman. The company utilizes a patented reactor that modifies particles to achieve dramatic improvements in productivity, quality and profitability, with a diverse range of applications in the eco-products arena for converting waste tyres into high value and durable construction products. We have worked with clients from different backgrounds world-wide. DENA Nano-Wood has developed an End of Life (EOL) tyre recycling technology that creates a range of high value and durable construction eco-products with zero emissions and zero waste. As the tyres are available worldwide for a fraction of price compared to virgin rubber, the raw materials cost is negative and there is also steel and fibre that can be reclaimed and sold off to provide an additional

income. Whilst tyre crumbing is established, the material forming technology is completely new and has no competitors as it is proprietary and covered by several International Patents since 1991. DENA Nano-Wood Ltd uses a unique process to produce these materials using micronized rubber and a special Nano-particle composite. The resulting material has an almost endless range of final products, all of which are infinitely recyclable using the same processes that created them in the first place. These range from super-strength and durable 'wood replacement' to special porous irrigation hose. Specification for this product's 100% water, humidity & sea water resistant, insects & fire resistant, resistant to all chemicals (e.g. salts, petrochemical, detergent and solvent).

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