

# **Syngrit**

## SDB 1000 Series

A Series of diamond saw grits from Element Six designed to cater for all applications in the stone and construction industries, providing the toolmaker with a comprehensive choice for the manufacture of diamond tools.

The SDB 1000 Series has been designed with an understanding of the relationship between the physical characteristics of the diamond crystals and their resulting influence on the wear and breakdown behaviour of the diamond particles during application. By identifying and controlling these important characteristics it has been possible to design a range of products covering the entire spectrum of applications required by the diamond toolmaker.

The SDB 1000 Series is produced using a nickel-iron solvent catalyst system in conjunction with state of the art Element Six diamond synthesis technology and proprietary control systems. This allows Element Six to satisfy the highest standards of product consistency whilst achieving maximum control over the diamond characteristics, which are known to be critical in application.

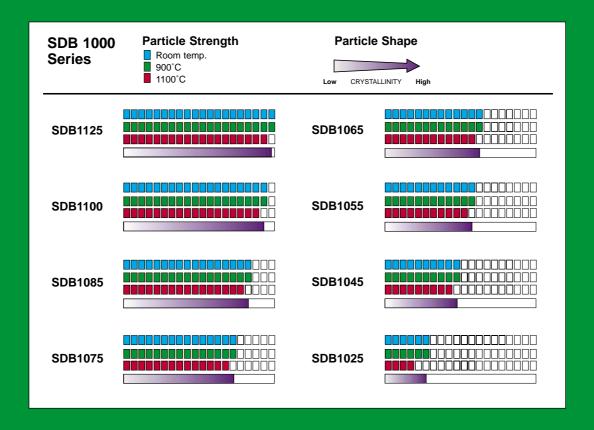
## **Advantages**

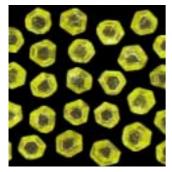
- Covers the entire spectrum of stone and construction applications.
- Produced using state of the art synthesis and processing technology.
- Unparalleled product consistency.
- Allows cost effective match of product and application.
- All products produced in accordance with ISO9001:2000 standards.



### THE INDICATOR SYSTEM

This system ranks the products in this Series in terms of relative particle strength and particle shape.





Optical image of SDB1125.

The SDB process yields crystals of cubo-octahedral morphology with a controlled range of crystallinity and metal inclusion content. This allows both the friability and breakdown behaviour of the product range to be controlled in a consistent and reproducible manner.

The products within the Series can be described and ranked in terms of the Element Six Indicator System, which allows the diamond toolmaker to easily identify products to suit specific applications. The Indicator System has been designed to be size independent thus allowing cross product comparisons.

The consistency of the SDB 1000 Series product is ensured through a rigorous ISO certified quality management system.

#### **AVAILABILITY**

Standard SDB 1000 Series products are available in the following sizes (half sizes are available on request):

SIZE AVAILABILITY									
U.S.Mesh	25/35	30/40	35/45	40/50	45/60	50/60	50/70	60/70	70/80
FEPA	D712	D602	D502	D427	D357	D301	D302	D251	D213
SDB1125									
SDB1100			-						
SDB1085									
SDB1075			-						
SDB1065									
SDB1055			-						
SDB1045									
SDB1025		-							

SDB Range grits are also available with a titanium coating (designated as T) and in an etched finish (designated as E).

