

Production of Titanium Porous Material ‘Tiporous’ and its Evaluation

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Abstract

Gas atomization furnace, Sumitomo Titanium Corporation originally designed, has been producing spherical and high quality Titanium fine powder, ‘Tilop’. Excellent Characteristics of Tilop and property of metal Ti itself (high corrosion resistance, high specific strength) have made us produce new titanium porous material, ‘Tiporous’. With optimization of green sheet preparation and sintering process, porous sheet of large size and wide range of thickness are produced and porous pipe and other custom made shape product are also available. Evaluation of mechanical, chemical, filtration and flow-controlling properties shows that these products have good characteristics and are applicable to various industrial field.