## **Duremium Alloy**

Duremium Alloy was devised in early YE 30 in a joint scientific and business venture between Kakutama Heavy Industries and the Lorath Matriarchy as an answer to the need for a durable, relatively lightweight and strong material for some commercial and military applications. The materials used for this substance are Durandium Alloy, and Nerimium. Both materials have their unique strengths and weaknesses, Durandium Alloy is as light as Aluminum and provides good protection for such a light weight material. Nerimium is a super dense metal note worthy for the superior protection and due to this is the mainstay of the NDI and Nepleslian Militaries. However both also have their short comings. Durandium Alloy can only provide so much strength as a lightweight material, and Nerimium while strong is also very heavy.

The two metals are melted down and allowed to 'stew' before the true process begins. Both forms of Structol, both A and B are introduced so as to begin a 'molecular selection process', Structol B begins breaking apart the molecules of the two materials and Structol A begins to sift through the impurities in each. Once this has begun a film will form along the surface of the smelter and must be removed as it is excess impurities and waste. As the process continues Structol B is instructed to re-arrange the molecules of Nerimium and Durandium Alloy into the molecular bonds necessary for Duremium Alloy. The end result from the combination of the two is a moderately light weight alloy, with the strength of Nerimium. Density has been reduced as a by product allowing it to be much lighter, and just as strong.

Once the process is complete, the Structol A and B are told to bond with the new alloy's molecular structure. Should the armor plating become damaged the Structol goes into action. To repair the damage, the Structol relocates existing armor material to fill in the gaps made by weapons fire or impacts, and is capable of smoothing out dents in the armor if necessary. Due to the uniqueness of the armor design, the armor can be computer controlled. The computer will calculate the frequency of impacts on the hull, and will make the armor denser in the areas the weapons fire seems to frequent the most.

- Producers: Kakutama Heavy Industries, Lorath Matriarchy ONLY
- Cost: Moderately Expensive
- Damage Rating (Version 3): 7

Note: Pronunciation is "Dreamium"

## **OOC Notes**

Authored by Soresu and approved by Andrew on Apr 6,  $2008^{11}$ 

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https://stararmy.com/roleplay-forum/index.php?threads/kakutama-heavy-industries-duremium-alloy.1958 /

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