

Adding value, from the ground up



It All Starts with Dirt This kind of dirt is called bauxite ore. If you were looking at a four-ton truckload of it and someone asked, "What can you make out of that?"—you would think, "Not much. Maybe the base for a driveway."

White Powder, White Metal But from four tons of bauxite, it's possible to refine about two tons of alumina—a powdery white oxide of aluminum. It's not easy. The technology is complex and the equipment is massive. But Alcoa has refined the refining process to an art. † And from those two tons of alumina, we can smelt a ton of aluminum. Smelting aluminum was the invention that launched Alcoa in 1888.

Miracles by the Ton A ton of aluminum is enough to make the cans for over 60,000 Cokes, Pepsis, or Buds. Enough to make the space-frames for seven full-size cars. Enough to make 40,000 computer memory disks, capable of storing all the books ever published. † All from a truckload of dirt. It's almost magical. And we're proud to have the magicians who can pull it off.

Step by Step Of course not everything Alcoa makes is aluminum. A significant portion of our annual revenue comes from related businesses, including vinyl siding, plastic closures and electrical distribution systems for cars and trucks. † But the rest involves aluminum. And here, in brief, is how it all happens—how Alcoa starts with dirt and, step by step, keeps on adding value until we and our customers are able to produce all of the modern wonders made of aluminum.

There is no other material quite like aluminum

- it is light in weight ■ highly resistant to corrosion
- strong in alloys ■ an excellent conductor of electricity and heat ■ an excellent reflector of heat and light ■ nonmagnetic ■ nontoxic ■ outstanding in cryogenic properties ■ highly workable ■ easy to assemble ■ and naturally good looking.

