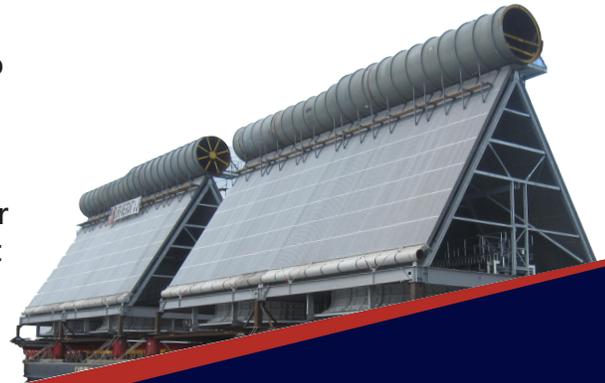


HI-MAX AIR COOLED CONDENSERS

Holtec's **HI-MAX** (Holtec International MAXimum reliability) is a transformative air cooled condensing (ACC) technology characterized by a stainless steel obround tube (referred to as the Core tube) whose flat stainless steel surfaces are equipped with closely spaced aluminum fins oriented in the transverse direction to the axis of the tube. The uniqueness of HI-MAX lies in the strength of the bond between the aluminum fins and the stainless steel core tube. The thickness, height and spacing of the fins have been optimized using state-of-the-art computational fluid dynamics codes to provide maximum fin efficiency for air flow parameters.

HI-MAX represents the culmination of the industry's decades old quest to eliminate carbon steel from the wetted surfaces of ACCs. The migration of iron ions into the condensate over the large inside wetted surface of the Core tubes in ACCs has been a nagging condensate water chemistry problem that has dogged the power industry ever since dry cooling by air was introduced in the late 1930s. HI-MAX is now the power industry's first and only finned tube that does not contain any carbon steel! The patents that protect Holtec's HI-MAX technology are pending at USPTO.



Thanks to
HI-MAX
*preservation of condensate
purity is a problem no more!*


HOLTECASIA

HI-MAX AIR COOLED CONDENSERS



CODES AND CONSENSUS STANDARDS

Holtec utilizes an array of codes and consensus standards in the design of ACCs.

ADVANTAGES OF HI-MAX

Historically, the ACC tube bundle becomes a veritable source of iron contamination of the circulating condensate forcing the plant owner to use 100% condensate polishing to prevent internal corrosion of the power cycle components. Replacing carbon steel tubes with stainless steel in HI-MAX eliminates the principal source of corrosion species, which makes a polishing system superfluous.

STATE-OF-THE-ART DESIGN METHODS

Holtec utilizes the Computational Fluid Dynamics (CFD) code FLUENT to predict thermal-hydraulic performance of its ACCs to quantify effects of chronic factors such as wind.

STANDARDIZATION

Holtec's HI-MAX is industry's first standardized ACC designed to meet any site requirements without extensive custom engineering.

MODULARIZATION

Holtec's standard ACC cell is designed with the goal to minimize the total installed cost to the owner.

VERTICAL INTEGRATION

Like all Holtec systems and components, the supply of the ACCs is vertically integrated.

CULTURE OF QUALITY

The entire ACC design/manufacturing life cycle occurs under a stringent culture of quality assurance that has helped the Company become America's leading supplier of engineered equipment and systems to the world's power industry.

PARALLEL CONDENSING

As its name implies, parallel condensing refers to condensing the turbine exhaust steam in a water cooled (wet) condenser and ACC in parallel. Holtec's water cooled condenser expertise is well known: The Company has supplied over 120 water-cooled condensers over the past three decades to power plants around the world, garnering an enviable record of performance and reliability.



**HI-MAX MANUFACTURING
FACILITY IN DAHEJ, INDIA**



SCAN TO LEARN MORE