

Hamilton Jet Model 273
 Application Review

Hamilton HJ273 Waterjets Conquer Hells Canyon



▶ Brief Specifications

SERVICE:
 Tourist Excursion Boat

TYPE:
 Bentz 40

LENGTH:
 12.20 metres (40') LOA

BEAM:
 9.22 metres (12'-6")

CONSTRUCTION:
 Aluminium

PAYLOAD:
 49 passengers

SPEED:
 50 knots
 (lightspeed maximum – GPS verified)

WATERJETS:
 Triple Hamilton Jet Model 273

ENGINES:
 Triple Cummins Diesels Model 6B
 Diamond, each
 235kW (315hp) @ 2800

DESIGNER/BUILDER:
 Bentz Boats,
 Lewiston, ID, USA

OPERATOR:
 Hells Canyon Adventures,
 Oxbow, OR, USA

Hamilton Jet DISTRIBUTOR:
 Hamilton Jet Inc.
 Seattle, WA, USA

Granite Creek runs through the Hells Canyon Wilderness area of Oregon and Idaho, the deepest canyon in North America. This spectacular river flows at up to 40,000 cubic metres per second and it is through this boiling cauldron of white water that a new Hamilton Jet powered excursion boat carries thrill-seeking tourists.

Triple Hamilton Model HJ273 jets driven by Cummins 6B Diamond diesel engines provide thrust to overcome the power of the river when the 42 foot long craft is laden with 49 passengers. Lightspeed speeds of over 50 knots are achievable.

The diesel/jet combination also proves to be very fuel efficient – over a 110 mile stretch of river, fuel consumption tests showed total fuel usage for all three engines was an economical 21.3 US gallons per hour.

The advanced impeller design of the Hamilton waterjet features parallel outside diameter blades on a large tapered hub. This concept incorporates both axial and radial flow characteristics, which results in a pump that provides several beneficial features, such as...

- Optimum flow/thrust for a given diameter;
- High resistance to cavitation;
- High tolerance to wear on the blade tips.

These are all features necessary for the efficient, safe and continuous operation of a commercial craft in the most arduous conditions of Hells Canyon.

Additionally, the outstanding manoeuvrability imparted by the Hamilton waterjets ensures instant response to helm commands – essential when negotiating turbulent rapids. Absence of exposed propellers and rudders minimises potential damage caused by grounding on submerged rocks.