

General Dynamics

Itronix GoBook® XR-1

Fully rugged protection meets good performance in a reasonably portable package.



General Dynamics

www.gd-computing.com

Price

\$4,195

Rating

★★★★☆

CPU

1.83-GHz Intel Core Duo

Operating System

Windows XP Professional

RAM/Expandable to

512MB/2GB

Hard Drive Size/Speed

40GB/5,400 rpm SATA

Optical Drive

8X DVD+R DL

Display/Resolution

12.1 inches/1024 x 768

Graphics/Video Memory

ATI Radeon Mobility X300/128MB dedicated

Wireless Networking

Bluetooth 1.2, 802.11a/b/g, and optional HSDPA/UMTS/EV-DO

Ports

Three USB 2.0, FireWire, VGA, Ethernet, modem, serial, media bay slot, headphone, mic, docking station

Card Slots

One Type I/II PC Card

Weight

8 pounds

Size

12 x 9.8 x 2.4 inches

Warranty/Support

Three-year warranty; one-year warranty on battery, charger, and carrying straps; toll-free phone support, 12 hours per day, Monday-Friday



When General Dynamics acquired the rugged-laptop manufacturer Itronix more than a year ago, the giant defense contractor must have somehow equipped its new possession with an afterburner from an F-16 jet fighter. Within a space of six months, the company introduced no fewer than three new rugged and semi-rugged notebooks, including the eye-catching semi-rugged Hummer. Now, with its first product under the General Dynamics brand, the company has issued the GoBook XR-1, which may well be the smallest fully rugged notebook on the market.

Lacking the rubber bumpers of the Rough Rider Max laptop, the newest GoBook achieves its durability with solid construction and a certain amount of style. For example, the relatively thick and well-braced LCD is attached to the rest of the magnesium alloy case by what looks and feels like an industrial-strength hinge. But the back of

the display features a stylish, wind-swept bulge that accommodates some of this unit's wireless antennas.

Despite its relatively small footprint, this rugged model is surely no lightweight. The GoBook XR-1 starts at 6.8 pounds without the handle or additional features. Our test unit came fully equipped and tipped the scale at 8 pounds. With the AC adapter, the total traveling weight was 9.1 pounds—still portable, but nowhere near thin-and-light status.

The manufacturer claims that the XR-1 can pass many of the MIL STD 810F durability tests (including three-foot drops) as well as the IP54 spec for dust and water intrusion. The most sensitive openings—those for the optical drive, the PC Card slot, and the SmartCard slot—are covered with waterproof plastic doors. The other ports for accessories such as headphones, networks, and

PROS

Rugged design
Small footprint for rugged notebook
Good performance
Great optional GPS system

CONS

Expensive
Runs warm
Limited tech support hours

external monitors are sealed. Even a large exhaust grill on the left panel of the laptop is protected from water.

The XR-1 is designed to accommodate four simultaneous wireless adapters: wireless LAN, WWAN, and Bluetooth, along with a GPS receiver. Our test unit was equipped with all but the wireless WAN adapter. The Intel 802.11a/b/g Wi-Fi adapter delivered above-average throughput from both 15 feet (15.5 Mbps) and 50 feet (13.6 Mbps). The GPS receiver was particularly powerful. Itronix uses special software for extended range and a quadra-helix antenna for faster acquisition times. The GPS system worked fine when sitting on the passenger seat of our car and even worked well indoors.

The screen measures 12.1 inches diagonally, which though appreciably smaller than the Rough Rider Max' 14 inches, is certainly large enough to get work done. It is equipped with a touch panel that you can activate with either your finger or a stylus. One of the nice touches of this model is that the manufacturer includes an extra stylus, which fits in a small indentation on the side of the screen. The LCD image held up pretty well in direct sunlight.

Our model came with a slot-loading DVD-ROM/CD-RW optical drive. The drive itself is protected behind a waterproof door. When the door opens, you simply insert the optical disc into a narrow slot. In other words, no fragile drawer pops out as on most other notebooks.

The keyboard is relatively large and comfortable without any oddly placed keys. The keys themselves are made of a white plastic that glows in the dark. A backlit keyboard is available as an option.

On our performance tests, the XR-1 blew away its competition in the 3DMark03 benchmark. It scored 1,996, which is 36 percent shy of the average mainstream notebook but about twice as fast as many of General Dynamic's rugged competitors. In

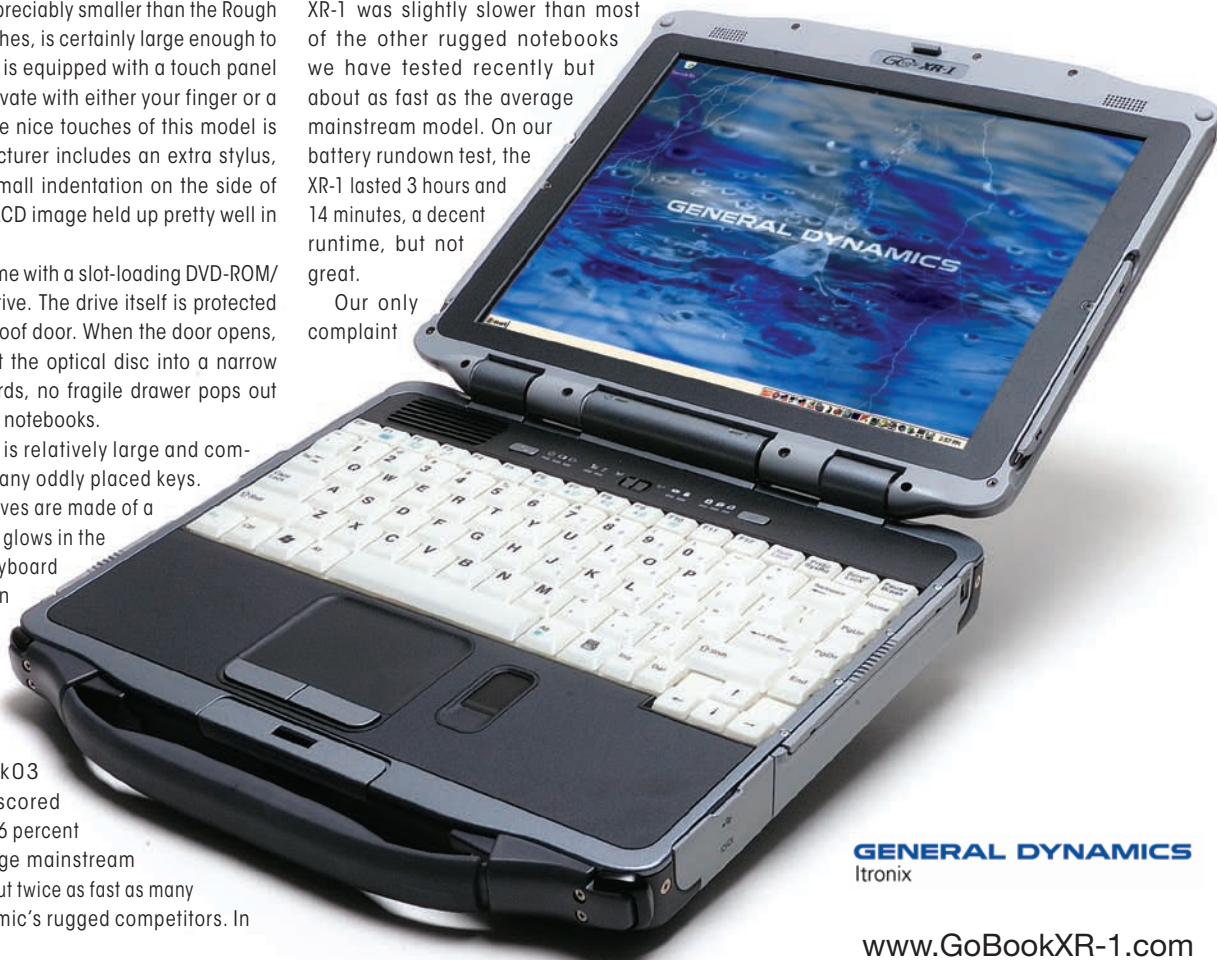


about the XR-1 concerns its heat management. During our tests, the unit became quite warm. The left half of the wrist rest became almost too hot for comfortable use. The left side of the bottom panel could be uncomfortable for some users when placed on their laps.

The base price for the General Dynamics Itronix GoBook XR-1 is \$4,195. We appreciate the generous three-year warranty on most components except for consumable parts such as the battery, the charger, and the carrying straps. Standard help-desk support is available 12 hours per day, Monday through Friday, along with a searchable knowledge base that is available 24/7. With its durable design and impressive 3D and GPS performance, this GoBook is good to go anywhere. —Rich Malloy

the broader MobileMark 2005 benchmark, the XR-1 was slightly slower than most of the other rugged notebooks we have tested recently but about as fast as the average mainstream model. On our battery rundown test, the XR-1 lasted 3 hours and 14 minutes, a decent runtime, but not great.

Our only complaint



GENERAL DYNAMICS
Itronix

www.GoBookXR-1.com

MobileMark 2005		211
3DMark03		1,996
Battery Life (hours:minutes)	Wi-Fi On	3:12
	Wi-Fi Off	3:14
Wireless Performance (Mbps)	15 Feet	15.5
	50 Feet	13.6

▲ Category Average