

Impinj R700 RAIN RFID Reader

for Enterprise-grade IoT Solutions



The Impinj R700 reader is designed to support global RAIN deployments that need industry-leading performance, enterprise-grade reliability and security, and support for next-gen RAIN tags.

Empowers reading tags farther and faster, and speeds time-to-solution

The Impinj R700 reader provides industry-leading performance, enterprise reliability and security, and modern developer tools. IoT developers can easily build and deploy custom enterprise applications with a Linux OS, REST API, and native support for industry-standard data formats and protocols, such as MQTT.

The Impinj R700 delivers increased support for on-reader applications—including 10x the processing power. Plus, when combined with tags based on Impinj M700 series tag chips, the Impinj R700 advances RAIN RFID performance at dock doors, conveyors, and store exits.



The Impinj R700 reader builds on the heritage of the Impinj Speedway reader family, which has been proven reliable for 15 years in the field.

Why use the Impinj R700 reader

Suitable for global RAIN RFID deployments, Impinj R700 readers deliver the performance and ease of use needed by enterprise deployments.

Deliver industry-leading performance: leverage industry-leading sensitivity, powerful edge processing, and high-speed network connectivity to enable fast reading of small, global RAIN RFID tags and open up new use cases.

Simplify RAIN deployments with IoT edge device: speed time-to-solution with increased on-reader memory, plus the Impinj IoT device interface that empowers IoT developers to easily connect applications to configure and control devices, and to consume RAIN data.

Meet demands of next-generation RAIN solutions: future-proof investments in RAIN RFID and next-gen tag chips with performance, reliability, and deployment simplicity for enterprise-grade solutions.

Connect everything with features that deliver industry-leading performance

Industry-leading sensitivity

Empowers reading tags farther and faster, and future-proofing of IoT solutions.

Powerful edge processing

Enables intelligent, on-reader, RAIN tag-processing algorithms.

Secure, upgradable Linux OS

Delivers enterprise-grade security and reliability, and the flexibility to customize with on-reader applications.

Simple IoT device interface

Easily connects IoT applications to configure and control devices, and to consume RAIN data, with native support for MQTT.

Optimized design for inventory

Increases read rate and improves read zone control at lower transmit power.

Rich peripheral and accessory support

Provides versatility with support for USB drives, Wi-Fi adapters, and up to 32 antennas via optional antenna hub.

Impinj Fixed Reader Portfolio		N D D D D D D D D D D D D D D D D D D D	IMPÎNJ	ийічмі
		R700	R420	R220
SPECIFICATIONS	Air interface protocol	RAIN RFID / ISO 18000-63 and EPCglobal Gen2v2 compliant		
	Antenna ports	4	4	2
	Read zones (max)	32	32	16
	Read rate (max per-second)	1,100	1,100	200
	Transmit power (max, dBm)	33	32.5	32.5
	Receive sensitivity (dBm)	-92	-84	-84
	Processor speed (GHz)	1 (Dual-core)	0.4 (Single core)	0.4 (Single core)
	Random-access memory (MB)	1,024	256	256
	Custom-application partition (CAP) size (MB)	128	32	32
FEATURES	Impinj IoT device interface	✓		
	Support for USB peripherals (slots)	3	1	1
	General-purpose input/output (GPIO) connector	Integrated	Accessory	Accessory
	Gigabit Ethernet network connectivity	✓		
	Power Sources	802.3af PoE/ 802.3at PoE+	All regions: AC-DC adapter All regions except EU2: IEEE 802.3af PoE EU2: IEEE 802.3at PoE+	

 $Impinj\ product\ performance\ is\ based\ on\ Impinj's\ modeling\ and\ test\ data,\ actual\ results\ may\ vary.$

For a list of supported regions and geographies please go to: www.impinj.com/supported_regions.

Ready to discuss how Impinj can help your business?

Contact us: www.impinj.com

Impinj (NASDAQ: PI) helps businesses and people analyze, optimize, and innovate by wirelessly connecting billions of everyday things—such as apparel, automobile parts, luggage, and shipments—to the Internet. The Impinj platform uses RAIN RFID to deliver timely data about these everyday things to business and consumer applications, enabling a boundless Internet of Things.

