

# Indoor Solid State Power Amplifiers



PARADISE  
DATACOM

AN INTELLEK GROUP COMPANY

## Overview

Solid state power amplifiers in the HPA series offer premium performance and reliability for satellite uplink applications. These high power amplifiers provide the linearity and gain stability required for earth station performance in a package that offers the system designer an easy path to integration.

A full range of monitor and control features are included in the standard configuration, eliminating the need for detailed option selection with each installation.

The long-term reliability of the system is ensured by a thorough approach to thermal management to keep key components in a safe operating range in all rated conditions.

With reliable power at guaranteed levels, solid state linearity, reliable thermal management, and a full complement of front panel, serial, and parallel interfaces, the HPA series offers the most flexible solution available for satellite earth station uplink.

## Features:

- ❖ Solid State Performance for Multicarrier Applications
- ❖ Complete Monitor and Control Capabilities
- ❖ Front Panel Keys & LCD for Local M & C
- ❖ 20 dB Gain Adjustment
- ❖ Temperature Compensation
- ❖ RF Input/Output Sample Port
- ❖ RS-232/422/485 Serial Interface for Remote M & C
- ❖ Parallel I/O; Form C Contact Closure Outputs & Opto-Isolated Inputs



## Options:

- ❖ 1:1 Redundant System
- ❖ 1:2 Redundant System
- ❖ Combined Systems
- ❖ DC Operation
- ❖ Custom Configurations

See your *Paradise Datacom* Sales Representative for more information!

# Indoor SSPA Summary

Rated Power (watts)	Model	Output Power		Gain (dB)	Power		Weight	Size	
		P1dB (dBm)	Saturation (dBm)		AC Voltage	Watts	lb (kg)	inches	mm
<b>C Band : 5.850 to 6.425 GHz (See Note 1 for band options)</b>									
10	HPAC-010A-RM	40.0	40.5	60	100 to 240	140	36 (16)	19 x 5.25 x 18	483 x 133 x 457
20	HPAC-020A-RM	43.0	43.5	60	100 to 240	220	36 (16)	19 x 5.25 x 18	483 x 133 x 457
30	HPAC-030A-RM	44.8	45.3	60	100 to 240	260	36 (16)	19 x 5.25 x 18	483 x 133 x 457
50	HPAC-050A-RM	47.0	47.5	60	100 to 240	350	36 (16)	19 x 5.25 x 18	483 x 133 x 457
50	HPAC-2050A-RM	46.8	47.0	75	90 to 265	450	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
75	HPAC-2075A-RM	48.5	48.8	75	90 to 265	550	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
100	HPAC-2100A-RM	49.5	50.0	75	90 to 265	700	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
140	HPAC-2140A-RM	51.2	51.5	75	90 to 265	870	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
200	HPAC-2200A-RM	52.3	53.0	75	180 to 265	1200	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
250	HPAC-2250A-RM	53.0	53.9	75	180 to 265	1500	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
300	HPAC-2300A-RM	54.0	54.7	75	180 to 265	2000	95 (43)	19 x 7.0 x 28.0	483 x 178 x 711
400	HPAC-2400A-RM	55.0	56.0	75	180 to 265	2500	95 (43)	19 x 7.0 x 28.0	483 x 178 x 711
500	HPAC-2500A-RM	56.0	57.0	75	180 to 265	3000	95 (43)	19 x 7.0 x 28.0	483 x 178 x 711
600	HPAC-2600A-RM	57.0	57.8	75	180 to 265	4000	95 (43)	19 x 7.0 x 28.0	483 x 178 x 711
<b>X Band: 7.900 to 8.400 GHz (See Note 2 for band options)</b>									
50	HPAX-2050A-RM	47.3	47.5	75	90 to 265	650	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
75	HPAX-2075A-RM	48.3	48.8	75	90 to 265	700	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
100	HPAX-2100A-RM	49.5	50.0	75	90 to 265	860	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
140	HPAX-2140A-RM	50.8	51.4	75	90 to 265	1225	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
200	HPAX-2200A-RM	51.8	52.9	75	180 to 265	1370	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
250	HPAX-2250A-RM	53.3	54.0	75	180 to 265	2450	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
350	HPAX-2350A-RM	54.5	55.5	75	180 to 265	2700	95 (43)	19 x 7.0 x 28.0	483 x 178 x 711
<b>Ku Band: 14.0 to 14.5 GHz (See Note 3 for band options)</b>									
25	HPAK-2025A-RM	43.0	44.0	75	90 to 265	350	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
35	HPAK-2035A-RM	44.5	45.4	75	90 to 265	400	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
40	HPAK-2040A-RM	45.0	46.0	75	90 to 265	600	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
50	HPAK-2050A-RM	46.0	47.0	75	90 to 265	650	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
70	HPAK-2070A-RM	47.5	48.5	75	90 to 265	780	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
100	HPAK-2100A-RM	49.0	50.0	75	180 to 265	1400	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
125	HPAK-2125A-RM	50.0	51.0	75	180 to 265	1700	85 (38)	19 x 7.0 x 28.0	483 x 178 x 711
200	HPAK-2200A-RM	52.0	53.0	75	180 to 265	2500	95 (43)	19 x 7.0 x 28.0	483 x 178 x 711
250	HPAK-2250A-RM	53.0	54.0	75	180 to 265	3000	95 (43)	19 x 7.0 x 28.0	483 x 178 x 711

**Notes:**

1. C Band units available to cover 5.850 to 6.725 GHz. Consult factory for specifications.
2. X Band units available to cover 7.70 to 8.40 GHz. Consult factory for specifications.
3. Ku Band units available to cover 13.75 to 14.5 GHz. Consult factory for specifications.

Specifications are subject to change without notice. Individual specifications available upon request.

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