AMARA RAJA
Gotta be a better way

Johnson Controls

HI-PERFORMANCE
VRLA
BATTERIES

POWERSTACK

The future belongs to those who stake a claim for it here and now. This axiom has been our guiding principle at Amara Raja, helping us ceaselessly innovate and explore the new and never-before.

Amara Raja has put its vision into practice by striding forward in the power management industry and consolidating its position as one of the leading players in the Asia-Pacific region. With Johnson Controls Inc., a world leader, as an equity alliance partner (26%), Amara Raja Pioneered the next generation battery technology in India. This partnership facilitates sharing of knowledge and innovations to accelerate and expand development efforts in the global battery market. It also enables harnessing technology that acclimatized batteries to operate in harsh tropical conditions.

Working together with alliance partner Johnson Controls, Amara Raja set up India's finest battery plant, the first such facility for Johnson Controls in the last decade. This facility is backed by one of the finest Research & Development centers on site. A center that constantly and unceasingly thinks out-of-the-box and develops products and services that match world-class standards, and sets industry benchmarks.

AMARA RAJA

Gotta be a better way

Amara Raja's Battery Excellence Center is another first for the region. Here, products are put through rigorous tests to ensure that they comply with international standards and design requirements. With the latest testing equipment, the center evaluates battery performance, design and longevity. Apart from this, there are facilities for application engineering, vehicle system study, simulations and computer-aided design, including a full calibration laboratory. Amara Raja's quality commitment has ensured that it conforms to International quality standards.

Amara Raja today has the distinction of being a prime player in the Johnson Controls led global alliance and is forging ahead in to new market - powered by innovation.

Amara Raja's Powerstack, a hi-performance battery is designed to meet the demands of a wide range of industrial applications. The Powerstack range, modular in structure, is capable of accommodating a wide spectrum of capacities depending on the application. Major application areas include Telecommunications, Power Utilities, Railways, Defence and other heavy industries.

POWERSTACK

POWERSTACK
The Reliable Powerhouse

PERFORMANCE EDGE

- Design Float life of 20 years and cyclic life of 4000 cycles at 20% DOD
- Leadership bolstered by proven performance in harsh tropical conditions, since 1989
- Deep discharge capability
- Modular design for ease of installation and stacking flexibility
- Unique Ribbed Design Polypropylene container and cover offering enhanced strength and durability for safe operation
- Patented Lead Oxide Paste Recipe offering excellent charge acceptance and low self-discharge rate
- Innovative Plate Design offers low internal resistance and superior high rate discharge performance
- Advanced AGM separator offering a longer service life and enhanced high rate discharge performance
- 100% charged when shipped from factory

QUALITY EDGE

- Produced in state-of-the-art ISO 9001, ISO 14001 & TS 16949 certified facility
- OHSAS 18001 certified
- Continuous improvement through Internationally acclaimed tools like TQM, Kaizen, Six Sigma, 5S

Quality Systems certified to
ISO 9001 : 2008
ISO / TS16949 : 2009
and ISO 14001 : 2004 &
OHSAS 18001 : 2007

TÜV CERT




Backed by its unflinching commitment to offer the best of technology and quality, Amara Raja offers you Powerstack, the reliable power house.

APPLICATION SPECTRUM

Powerstack provides robust backup power solutions for varied applications.

MAJOR APPLICATION AREAS INCLUDE:

- *Telecommunications* - Basic Telephony, Cellular Telephony, Transmission, Last Mile Connectivity, Local Network Broadband, Microwave
- *Uninterruptible Power Supply Systems* - Data Processing, Process Instrumentation, Automated Banking
- *Power Utilities* - Switchgear & Instrumentation Controls, Transmission & Distribution
- *Railways* - Train lighting, Air-conditioning
- *Solar Photo Voltaics (SPV)* - Offshore Oil Exploration Platforms & Cathodic Protection
- *Process & Service Industry*
- *Defence*

INTERNATIONAL COMPLIANCE

- ISO 9001:2008, ISO 14001:2008, TS 16949:2009, OHSAS 18001 : 2007 certified facilities
- CE Marking for Conformité Européene, ratified by Underwriters Laboratories
- Compliance to IS 15549
- Compliance to IEC 60896-21/22:2004 standards
- Classified as Non Hazardous Cargo and complies to requirements of IMDG (International Maritime Code for Dangerous Goods)
- Complies to Air Transport Requirement - IATA/ICAO special provision A67
- Complies to 1997 UBC Zone 4 Seismic Requirements
- Completely Recyclable - Lead, Plastic and Sulphuric acid can be recycled and reused
- UL Approved

TECHNICAL SPECIFICATIONS

PRODUCT:

- *Container & Cover* - Polypropylene Co-polymer (fire-retardant optional)
- *AGM Separator* - Spun glass micro-porous matrix with high compression.
- *Positive Plate* - SRS Grid Flat Pasted Type
- *Positive Plate Alloy* - Hybrid Alloy with deep discharge and long life characteristics
- *Negative Plate* - SRS Grid Flat Pasted Type
- *Negative Plate Alloy* - Lead Calcium Alloy with Maintenance-Free characteristics
- *Safety Valve* - Self resealing, pressure regulated, explosion-proof
- *Terminals* - Lead terminals with copper inserts with a large surface area to provide maximum conductivity
- *Connectors* - Heavy-duty lead plated copper connectors
- *Trays* - Acid resistant MS trays, self-stackable type
- *Color* - Coded terminal polarity - Provides easy terminal identification

RANGE SPECIFICATIONS

Powerstack is available in varied ranges to meet customers' complex business needs. Powerstack is available in modular design, with 2V as the basic cell, with capacities ranging from 100Ah to 6000Ah, housed in self-stackable MS trays.

DISCHARGE DATASHEET ATTACHED

PERFORMANCE:

- Self-discharge: Less than 1% per week
- Shelf life without re-charge: Upto 6 months
- Operating conditions: - 40° C to + 60° C
- Design Float Life: 20 Years
- Design Cycle Life: 4000 @20% DOD; 2000 @50% DOD; 1200 @ 80% DOD
- Recombination Efficiency: > 98%

NOTE:

- All values are rated at 27°C.
- Charging parameters at 27°C.

Method: Constant Potential Current Limited

Charge Provision	Charging Voltage	Maximum Charging Current (Amps)
Float charge	2.23 - 2.25 VPC	0.2 C
Boost charge	2.30 - 2.32 VPC	0.2 C

C is the rated capacity @ 10 hour

**Please refer to operating manual for storage instructions*

POWERSTACK

POWERSTACK RANGE

SPECIFICATIONS

MODULE SPECIFICATION AND PERFORMANCE DATA														
Sl. No.	Cell type	Nominal Ah Capacity @ C10 to 1.75 ECV at 27° C	System Module Voltage (V)	Stacking dimensions ± 5 mm			Module weight ± 5 KGS	Amperes to 1.75 VPC @ 27° C						
				W	D	H		30Min	1Hr	2Hr	3Hr	5Hr	8Hr	10Hr
1	IP6005	100	24	706	350	236	97	75	57	36	27	17	12.1	10
2	IP7005	120	24	706	385	236	107	90	69	43	32	21	14.5	12
3	IP6009	200	24	706	350	355	166	149	114	72	54	35	24.2	20
4	IP7009	240	24	706	385	355	187	179	137	86	65	42	29	24
5	IP1009	300	12	706	500	200	125	224	171	108	81	52	36.2	30
6	IP1011	375	12	706	500	232	150	280	214	134	101	66	45.3	37.5
7	IP1013	450	12	706	500	262	175	336	257	161	122	79	54.3	45
8	IP1017	600	12	706	500	322	226	448	343	215	162	105	72.5	60
9	IP1021	750	6	706	500	214	147	560	429	269	203	131	90.6	75
10	IP1025	900	6	706	500	244	173	672	514	323	243	157	108.7	90
11	IP1031	1125	6	706	500	289	211	840	643	403	304	197	135.9	112.5
12	IP1037	1350	6	706	500	333	252	1007	771	484	365	236	163	135
13	IP1051	1800	12	706	500	966	678	1343	1029	645	486	315	217.4	180
14	IP1063	2250	6	706	500	642	441	1679	1286	806	608	393	271.7	225
15	IP1075	2700	6	706	500	732	519	2015	1543	968	730	472	326.1	270
16	IP1093	3375	6	706	500	867	633	2519	1929	1210	912	590	407.6	337.5
17	IP1111	4050	6	706	500	999	756	3022	2314	1452	1095	708	489.1	405
18	IP1124	4500	6	706	500	1156	844	3358	2571	1613	1216	787	543.5	450
19	IP1148	5400	6	706	500	1332	1008	4030	3086	1935	1459	944	652.2	540
20	IP2009	340	12	706	555	200	138	254	194	122	92	59	41.1	34
21	IP2011	425	12	706	555	232	167	317	243	152	115	74	51.3	42.5
22	IP2013	510	12	706	555	262	195	381	291	183	138	89	61.6	51
23	IP2017	680	12	706	555	322	251	507	389	244	184	119	82.1	68
24	IP2021	850	6	706	555	214	164	634	486	305	230	149	102.7	85
25	IP2025	1020	6	706	555	244	192	761	583	366	276	178	123.2	102
26	IP2031	1275	6	706	555	289	235	951	729	457	345	223	154	127.5
27	IP2037	1530	6	706	555	333	280	1142	874	548	414	267	184.8	153
28	IP2051	2040	12	706	555	966	753	1522	1166	731	551	357	246.4	204
29	IP2063	2550	6	706	555	642	492	1903	1457	914	689	446	308	255
30	IP2075	3060	6	706	555	732	576	2284	1749	1097	827	535	369.6	306
31	IP2093	3825	6	706	555	867	705	2854	2186	1371	1034	669	462	382.5
32	IP2111	4590	6	706	555	999	840	3425	2623	1645	1241	802	554.3	459
33	IP2124	5100	6	706	555	1156	940	3806	2914	1828	1378	892	615.9	510
34	IP2148	6120	6	706	555	1332	1120	4567	3497	2194	1654	1070	739.1	612
35	IP3011	400	12	706	500	232	155	299	229	143	108	70	48.3	40

Note: 1. "D" dimensions are without front cover

2. Installation drawing will supersedes the catalogue for dimensions.

POWERSTACK

RANGE SPECIFICATIONS

WATTS PER CELL DATA TO 1.75 ECV @ 27°C

Sl. No.	Cell type	Nominal Air Capacity @ C10 at 27° C	Discharge Power in Watts															
			5 Min	10 Min	15 Min	30 Min	1 Hrs	2 Hrs	3 Hrs	4 Hrs	5 Hrs	6 Hrs	7 Hrs	8 Hrs	10 Hrs	12 Hrs	20 Hrs	24 Hrs
1	IP6005	100	249	201	183	139	108	68	52	41	34	29.2	25.9	23.3	19.4	17.1	11.2	9.5
2	IP7005	120	299	241	219	166	129	82	62	49	40	35	31.1	28.0	23.2	20.5	13.4	11.4
3	IP6009	200	498	402	366	277	215	136	103	82	67	58.4	51.8	46.7	38.7	34.1	22.3	9.1
4	IP7009	240	597	483	439	332	258	163	124	99	81	70.1	62.2	56	46.4	41	26.8	22.9
5	IP1009	300	747	603	548	416	323	204	155	123	101	88	78	70	58	51	33	29
6	IP1011	375	933	754	686	519	404	255	194	154	126	109	97	88	73	64	42	36
7	IP1013	450	1120	905	823	623	484	306	232	185	151	131	117	105	87	77	50	43
8	IP1017	600	1493	1207	1097	831	646	408	310	247	202	175	156	140	116	102	67	57
9	IP1021	750	1867	1508	1371	1039	807	510	387	309	252	219	195	175	145	128	84	71
10	IP1025	900	2240	1810	1645	1247	969	612	465	370	303	263	233	210	174	154	100	86
11	IP1031	1125	2800	2263	2057	1558	1211	765	581	463	378	328	292	263	218	192	126	107
12	IP1037	1350	3360	2715	2468	1870	1453	918	697	555	454	394	350	315	261	231	151	129
13	IP1051	1800	4480	3620	3290	2493	1938	1224	929	740	605	526	467	420	348	307	201	172
14	IP1063	2250	5600	4525	4113	3116	2422	1530	1161	926	757	657	584	525	435	384	251	214
15	IP1075	2700	6720	5430	4936	3740	2907	1836	1394	1111	908	788	700	630	522	461	301	257
16	IP1093	3375	8400	6788	6170	4675	3633	2295	1742	1388	1135	985	876	788	653	576	377	322
17	IP1111	4050	10080	8145	7403	5610	4360	2754	2091	1666	1362	1182	1051	945	784	692	452	386
18	IP1124	4500	11200	9050	8226	6233	4845	3060	2323	1851	1514	1314	1167	1051	871	768	502	429
19	IP1148	5400	13440	10860	9871	7479	5813	3672	2788	2221	1816	1577	1401	1261	1045	922	603	515
20	IP2009	340	846	684	622	471	366	231	176	140	114	99	88	79	66	58	38	32
21	IP2011	425	1058	855	777	589	458	289	219	175	143	124	110	99	82	73	47	41
22	IP2013	510	1269	1026	932	706	549	347	263	210	172	149	132	119	99	87	57	49
23	IP2017	680	1692	1368	1243	942	732	462	351	280	229	199	176	159	132	116	76	65
24	IP2021	850	2116	1709	1554	1177	915	578	439	350	286	248	220	198	164	145	95	81
25	IP2025	1020	2539	2051	1865	1413	1098	694	527	420	343	298	265	238	197	174	114	97
26	IP2031	1275	3173	2564	2331	1766	1373	867	658	525	429	372	331	298	247	218	142	122
27	IP2037	1530	3808	3077	2797	2119	1647	1040	790	629	515	447	397	357	296	261	171	146
28	IP2051	2040	5077	4103	3729	2826	2196	1387	1053	839	686	596	529	476	395	348	228	194
29	IP2063	2550	6347	5128	4661	3532	2745	1734	1316	1049	858	745	661	595	493	435	285	243
30	IP2075	3060	7616	6154	5594	4238	3294	2081	1580	1259	1029	893	794	714	592	522	342	292
31	IP2093	3825	9520	7693	6992	5298	4118	2601	1975	1574	1287	1117	992	893	740	653	427	365
32	IP2111	4590	11424	9231	8391	6357	4941	3121	2369	1888	1544	1340	1191	1072	888	784	512	437
33	IP2124	5100	12693	10257	9323	7064	5491	3468	2633	2098	1715	1489	1323	1191	987	871	569	486
34	IP2148	6120	15232	12308	11187	8477	6589	4161	3159	2518	2059	1787	1588	1429	1184	1045	683	583
35	IP3011	400	996	804	731	554	431	272	206	165	135	116.8	103.6	93.4	77.4	68.3	44.6	38.1

POWERSTACK

RANGE SPECIFICATIONS

WATTS PER CELL DATA TO 1.90ECV @ 27°C

Sl. No.	Cell type	Nominal Ah Capacity @ C10 at 27° C	Discharge Power in Watts															
			5Min	10Min	15Min	30Min	1Hrs	2Hrs	3Hrs	4Hrs	5Hrs	6Hrs	7Hrs	8Hrs	10Hrs	12Hrs	20Hrs	24Hrs
1	IP6005	100	220	178	152	116	95	59	44	36	29	25	22.3	20.1	16.5	14.6	8.9	7.8
2	IP7005	120	264	214	182	140	115	71	53	43	35	30	26.7	24.1	19.8	17.5	10.7	9.4
3	IP6009	200	440	356	304	233	191	118	89	72	58	50	44.6	40.1	33.1	29.2	17.8	15.7
4	IP7009	240	528	427	365	279	229	142	107	86	69	60	53.5	48.2	39.7	35	21.4	18.8
5	IP1009	300	660	534	456	349	286	178	133	108	86	75	67	60	50	44	27	23
6	IP1011	375	825	667	570	437	358	222	167	135	108	94	84	75	62	55	33	29
7	IP1013	450	990	801	684	524	430	266	200	162	130	113	100	90	74	66	40	35
8	IP1017	600	1320	1068	912	699	573	355	267	215	173	151	134	120	99	88	53	47
9	IP1021	750	1651	1335	1140	873	716	444	334	269	216	188	167	151	124	109	67	59
10	IP1025	900	1981	1602	1368	1048	859	533	400	323	259	226	201	181	149	131	80	70
11	IP1031	1125	2476	2002	1710	1310	1074	666	500	404	324	282	251	226	186	164	100	88
12	IP1037	1350	2971	2402	2052	1572	1289	799	601	485	389	339	301	271	223	197	120	106
13	IP1051	1800	3961	3203	2737	2096	1719	1065	801	646	519	452	401	361	298	263	160	141
14	IP1063	2250	4952	4004	3421	2619	2148	1331	1001	808	648	565	502	452	372	328	200	176
15	IP1075	2700	5942	4805	4105	3143	2578	1598	1201	970	778	677	602	542	446	394	240	211
16	IP1093	3375	7427	6006	5131	3929	3222	1997	1501	1212	972	847	753	677	558	492	300	264
17	IP1111	4050	8913	7207	6157	4715	3867	2396	1802	1455	1167	1016	903	813	669	591	360	317
18	IP1124	4500	9903	8008	6842	5239	4297	2663	2002	1616	1296	1129	1003	903	744	656	400	352
19	IP1148	5400	11884	9610	8210	6287	5156	3195	2402	1939	1556	1355	1204	1084	893	788	480	423
20	IP2009	340	748	605	517	396	325	201	151	122	98	85	76	68	56	50	30	27
21	IP2011	425	935	756	646	495	406	251	189	153	122	107	95	85	70	62	38	33
22	IP2013	510	1122	908	775	594	487	302	227	183	147	128	114	102	84	74	45	40
23	IP2017	680	1496	1210	1034	792	649	402	303	244	196	171	152	136	112	99	61	53
24	IP2021	850	1871	1513	1292	990	812	503	378	305	245	213	190	171	140	124	76	67
25	IP2025	1020	2245	1815	1551	1187	974	604	454	366	294	256	227	205	169	149	91	80
26	IP2031	1275	2806	2269	1938	1484	1217	754	567	458	367	320	284	256	211	186	113	100
27	IP2037	1530	3367	2723	2326	1781	1461	905	681	550	441	384	341	307	253	223	136	120
28	IP2051	2040	4489	3630	3101	2375	1948	1207	908	733	588	512	455	409	337	298	182	160
29	IP2063	2550	5612	4538	3877	2969	2435	1509	1134	916	735	640	569	512	421	372	227	200
30	IP2075	3060	6734	5445	4652	3562	2922	1811	1361	1099	881	768	682	614	506	446	272	240
31	IP2093	3825	8418	6807	5815	4453	3652	2263	1702	1374	1102	960	853	768	632	558	340	299
32	IP2111	4590	10101	8168	6978	5344	4383	2716	2042	1649	1322	1152	1023	921	759	669	408	359
33	IP2124	5100	11224	9076	7754	5937	4869	3018	2269	1832	1469	1280	1137	1023	843	744	454	399
34	IP2148	6120	13468	10891	9304	7125	5843	3621	2723	2198	1763	1536	1365	1228	1012	893	545	479
35	IP3011	400	880	712	608	466	382	237	178	144	115	100.4	89.1	80.3	66.1	58.3	35.6	31.3

POWERSTACK

RANGE SPECIFICATIONS

AMPERES TO 1.75ECV @ 27°C

Sl. No.	Cell type	Nominal Ah Capacity @ C10 at 27° C	Discharge Current in Amps															
			5 Min	10 Min	15 Min	30 Min	1 Hrs	2 Hrs	3 Hrs	4 Hrs	5 Hrs	6 Hrs	7 Hrs	8 Hrs	10 Hrs	12 Hrs	20 Hrs	24 Hrs
1	IP6005	100	139	111	100	75	57	36	27	21	17	15.2	13.4	12.1	10	8.8	5.7	4.9
2	IP7005	120	167	133	120	90	69	43	32	26	21	18.2	16.1	14.5	12	10.6	6.9	5.9
3	IP6009	200	278	222	200	149	114	72	54	43	35	30.3	26.8	24.2	20	17.6	11.5	9.8
4	IP7009	240	333	267	240	179	137	86	65	52	42	36.4	32.2	29	24	21.1	13.8	11.8
5	IP1009	300	417	333	300	224	171	108	81	64	52	45.5	40.3	36.2	30	26.4	17.2	14.7
6	IP1011	375	521	417	375	280	214	134	101	80	66	56.8	50.3	45.3	37.5	33	21.6	18.4
7	IP1013	450	625	500	450	336	257	161	122	97	79	68.2	60.4	54.3	45	39.6	25.9	22.1
8	IP1017	600	833	667	600	448	343	215	162	129	105	90.9	80.5	72.5	60	52.9	34.5	29.4
9	IP1021	750	1042	833	750	560	429	269	203	161	131	113.6	100.7	90.6	75	66.1	43.1	36.8
10	IP1025	900	1250	1000	900	672	514	323	243	193	157	136.4	120.8	108.7	90	79.3	51.7	44.1
11	IP1031	1125	1563	1250	1125	840	643	403	304	241	197	170.5	151	135.9	112.5	99.1	64.7	55.1
12	IP1037	1350	1875	1500	1350	1007	771	484	365	290	236	204.5	181.2	163.0	135	118.9	77.6	66.2
13	IP1051	1800	2500	2000	1800	1343	1029	645	486	386	315	272.7	241.6	217.4	180	158.6	103.4	88.2
14	IP1063	2250	3125	2500	2250	1679	1286	806	608	483	393	340.9	302	271.7	225.0	198.2	129.3	110.3
15	IP1075	2700	3750	3000	2700	2015	1543	968	730	579	472	409.1	362.4	326.1	270	237.9	155.2	132.4
16	IP1093	3375	4688	3750	3375	2519	1929	1210	912	724	590	511.4	453.0	407.6	337.5	297.4	194	165.4
17	IP1111	4050	5625	4500	4050	3022	2314	1452	1095	869	708	613.6	543.6	489.1	405	356.8	232.8	198.5
18	IP1124	4500	6250	5000	4500	3358	2571	1613	1216	966	787	681.8	604.0	543.5	450	396.5	258.6	220.6
19	IP1148	5400	7500	6000	5400	4030	3086	1935	1459	1159	944	818.2	724.8	652.2	540	475.8	310.3	264.7
20	IP2009	340	472	378	340	254	194	122	92	73	59	51.5	45.6	41.1	34	30	19.5	16.7
21	IP2011	425	590	472	425	317	243	152	115	91	74	64.4	57	51.3	42.5	37.4	24.4	20.8
22	IP2013	510	708	567	510	381	291	183	138	109	89	77.3	68.5	61.6	51	44.9	29.3	25
23	IP2017	680	944	756	680	507	389	244	184	146	119	103.0	91.3	82.1	68	59.9	39.1	33.3
24	IP2021	850	1181	944	850	634	486	305	230	182	149	128.8	114.1	102.7	85	74.9	48.9	41.7
25	IP2025	1020	1417	1133	1020	761	583	366	276	219	178	154.5	136.9	123.2	102	89.9	58.6	50
26	IP2031	1275	1771	1417	1275	951	729	457	345	274	223	193.2	171.1	154	127.5	112.3	73.3	62.5
27	IP2037	1530	2125	1700	1530	1142	874	548	414	328	267	231.8	205.4	184.8	153	134.8	87.9	75
28	IP2051	2040	2833	2267	2040	1522	1166	731	551	438	357	309.1	273.8	246.4	204	179.7	117.2	100
29	IP2063	2550	3542	2833	2550	1903	1457	914	689	547	446	386.4	342.3	308	255	224.7	146.6	125
30	IP2075	3060	4250	3400	3060	2284	1749	1097	827	657	535	463.6	410.7	369.6	306	269.6	175.9	150
31	IP2093	3825	5313	4250	3825	2854	2186	1371	1034	821	669	579.5	513.4	462	382.5	337	219.8	187.5
32	IP2111	4590	6375	5100	4590	3425	2623	1645	1241	985	802	695.5	616.1	554.3	459	404.4	263.8	225
33	IP2124	5100	7083	5667	5100	3806	2914	1828	1378	1094	892	772.7	684.6	615.9	510	449.3	293.1	250
34	IP2148	6120	8500	6800	6120	4567	3497	2194	1654	1313	1070	927.3	821.5	739.1	612	539.2	351.7	300
35	IP3011	400	556	444	400	299	229	143	108	86	70	60.6	53.7	48.3	40	35.2	23	19.6

POWERSTACK

RANGE SPECIFICATIONS

AMPERES TO 1.90ECV @ 27°C

Sl. No.	Cell type	Nominal Ah Capacity @ C10 at 27° C	Discharge Current in Amps															
			5Min	10Min	15Min	30Min	1Hrs	2Hrs	3Hrs	4Hrs	5Hrs	6Hrs	7Hrs	8Hrs	10Hrs	12Hrs	20Hrs	24Hrs
1	IP6005	100	116	93	79	60	49	30	23	18	15	12.8	11.9	10.2	8.3	7.3	4.5	3.9
2	IP7005	120	140	112	95	72	59	36	27	22	18	15.3	14.3	12.2	10	8.8	5.4	4.7
3	IP6009	200	233	187	159	120	98	61	45	37	29	25.5	23.8	20.3	16.7	14.7	8.9	7.8
4	IP7009	240	279	224	190	145	118	73	55	44	35	30.6	28.6	24.4	20	17.6	10.7	9.4
5	IP1009	300	349	280	238	181	147	91	68	55	44	38.3	35.7	30.5	25	22	13.4	11.8
6	IP1011	375	436	350	298	226	184	114	85	69	55	47.8	44.6	38.1	31.3	27.6	16.8	14.7
7	IP1013	450	523	421	357	271	221	136	102	82	66	57.4	53.6	45.8	37.6	33.1	20.1	17.6
8	IP1017	600	698	561	476	361	294	182	136	110	88	76.5	71.4	61	50.1	44.1	26.8	23.5
9	IP1021	750	872	701	595	452	368	227	170	137	110	95.7	89.3	76.3	62.6	55.1	33.5	29.4
10	IP1025	900	1047	841	714	542	441	273	205	165	132	114.8	107.1	91.6	75.1	66.1	40.2	35.3
11	IP1031	1125	1308	1051	893	678	551	341	256	206	165	143.5	133.9	114.4	93.9	82.7	50.3	44.1
12	IP1037	1350	1570	1262	1071	813	662	409	307	247	198	172.2	160.7	137.3	112.7	99.2	60.3	52.9
13	IP1051	1800	2093	1682	1429	1084	882	545	409	330	264	229.6	214.3	183.1	150.3	132.3	80.4	70.6
14	IP1063	2250	2616	2103	1786	1355	1103	682	511	412	330	287.0	267.9	228.9	187.8	165.3	100.5	88.2
15	IP1075	2700	3140	2523	2143	1627	1324	818	614	495	396	344.4	321.4	274.7	225.4	198.4	120.6	105.9
16	IP1093	3375	3924	3154	2679	2033	1654	1023	767	618	495	430.5	401.8	343.3	281.7	248	150.8	132.4
17	IP1111	4050	4709	3785	3214	2440	1985	1227	920	742	594	516.6	482.1	412	338.1	297.6	181	158.8
18	IP1124	4500	5233	4206	3571	2711	2206	1364	1023	824	660	574	535.7	457.8	375.6	330.6	201.1	176.5
19	IP1148	5400	6279	5047	4286	3253	2647	1636	1227	989	792	688.8	642.9	549.3	450.8	396.8	241.3	211.8
20	IP2009	340	395	318	270	205	167	103	77	62	50	43.4	40.5	34.6	28.4	25	15.2	13.3
21	IP2011	425	494	397	337	256	208	129	97	78	62	54.2	50.6	43.2	35.5	31.2	19	16.7
22	IP2013	510	593	477	405	307	250	155	116	93	75	65.1	60.7	51.9	42.6	37.5	22.8	20
23	IP2017	680	791	636	540	410	333	206	155	125	100	86.7	81	69.2	56.8	50	30.4	26.7
24	IP2021	850	988	794	675	512	417	258	193	156	125	108.4	101.2	86.5	71	62.5	38	33.3
25	IP2025	1020	1186	953	810	614	500	309	232	187	150	130.1	121.4	103.8	85.1	74.9	45.6	40
26	IP2031	1275	1483	1192	1012	768	625	386	290	234	187	162.6	151.8	129.7	106.4	93.7	57	50
27	IP2037	1530	1779	1430	1214	922	750	464	348	280	224	195.2	182.1	155.6	127.7	112.4	68.4	60
28	IP2051	2040	2372	1907	1619	1229	1000	618	464	374	299	260.2	242.9	207.5	170.3	149.9	91.2	80
29	IP2063	2550	2965	2383	2024	1536	1250	773	580	467	374	325.3	303.6	259.4	212.9	187.4	113.9	100
30	IP2075	3060	3558	2860	2429	1843	1500	927	695	560	449	390.3	364.3	311.3	255.4	224.8	136.7	120
31	IP2093	3825	4448	3575	3036	2304	1875	1159	869	701	561	487.9	455.4	389.1	319.3	281	170.9	150
32	IP2111	4590	5337	4290	3643	2765	2250	1391	1043	841	673	585.5	546.4	466.9	383.1	337.3	205.1	180
33	IP2124	5100	5930	4766	4048	3072	2500	1545	1159	934	748	650.5	607.1	518.8	425.7	374.7	227.9	200
34	IP2148	6120	7116	5720	4857	3687	3000	1855	1391	1121	897	780.6	728.6	622.6	510.9	449.7	273.5	240
35	IP3011	400	465	374	317	241	196	121	91	73	59	51	47.6	40.7	33.4	29.4	17.9	15.7

Customer referrals