

**Assembly Transfer of Select BGA Products and Conversion
to CSP_BGA to STATS ChipPAC Korea**

**Qualification Plan Summary for
CSP_BGA at STATS ChipPAC Korea**

TEST	SPECIFICATION	SAMPLE SIZE	EXPECTED COMPLETION DATE
Temperature Cycle (TC)*	JEDEC <i>JESD22-A104</i>	3 x 32	Nov 2020
Solder Heat Resistance (SHR)*	JEDEC/IPC <i>J-STD-020</i>	3 x 11	Nov 2020
Temperature Humidity Bias (THB)*	JEDEC <i>JESD22-A101</i>	3 x 32	Nov 2020
High Temperature Storage (HTS)	JEDEC <i>JESD22-A103</i>	1 x 32	Nov 2020
Unbiased Highly Accelerated Stress Test (UHAST)*	JEDEC <i>JESD22-A102</i>	3 x 32	Nov 2020

* Preconditioned per JEDEC/IPC J-STD-020.

BOM Change Summary

▶ ASDP-BF33 and ADSP-BF533L (19x19_MM)

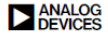
Assembly Site	STATS Singapore - STA (From)	STATS Korea – SK3 (To)
Wire	Au / 1.0 mil	Au / 1.0 mil
Die Attach	Ablestik 2000 conductive	Ablestik 2000B conductive
Mold Compound	Sumitomo G770	KE-G2280TS (<i>Low alpha EMC for DSP products</i>)
Ball Size	0.6	0.6
Ball Composition	96.5Sn_3.0Ag_0.5Cu	96.5Sn_3.0Ag_0.5Cu
Plating	100Sn	100Sn

BOM Change Summary

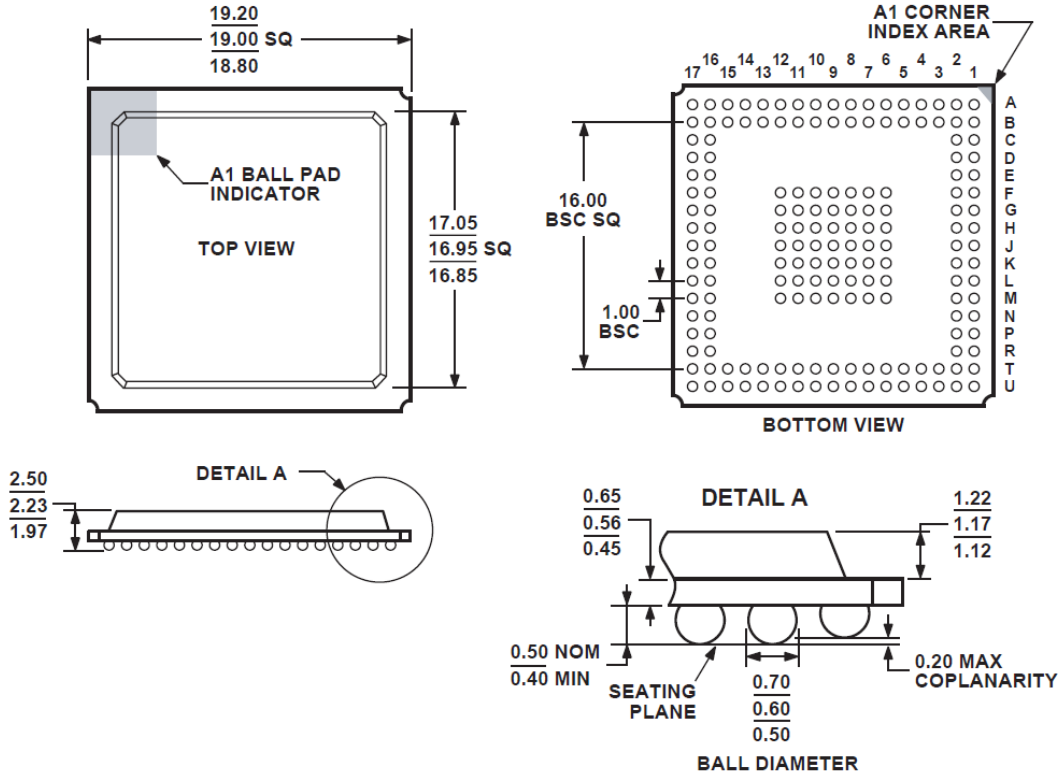
▶ ASDP-TS101S (19x19_MM)

Assembly Site	STATS Singapore - STA (From)	STATS Korea – SK3 (To)
Wire	Au / 1.2 mil	Au / 1.2 mil
Die Attach	Ablestik 2000 conductive	Ablestik 2000B conductive
Mold Compound	Sumitomo G770	KE-G2280TS (<i>Low alpha EMC for DSP products</i>)
Ball Size	0.45	0.45
Ball Composition	96.5Sn_3.0Ag_0.5Cu	96.5Sn_3.0Ag_0.5Cu
Plating	100Sn	100Sn

Package Outline Drawing Summary



169-Ball Plastic Ball Grid Array [PBGA] (B-169)
Dimensions shown in millimeters

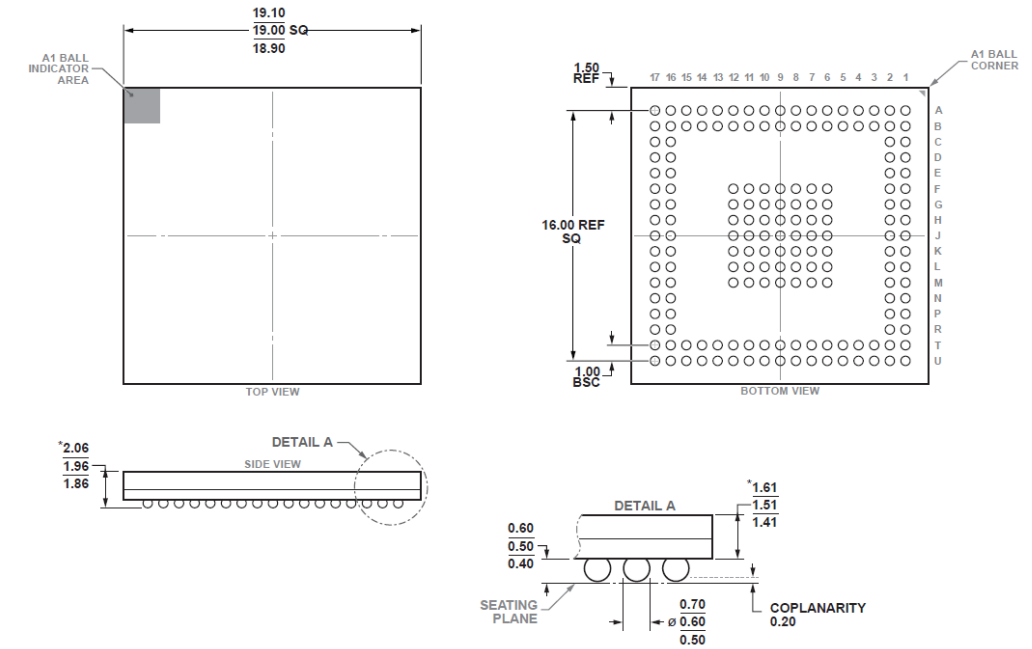


COMPLIANT TO JEDEC STANDARDS MS-034-AAG-2

PBGA – B-169
2.50mm Max Height



169-Ball Chip Scale Package Ball Grid Array [CSP_BGA] (BC-169-5)
Dimensions shown in millimeters



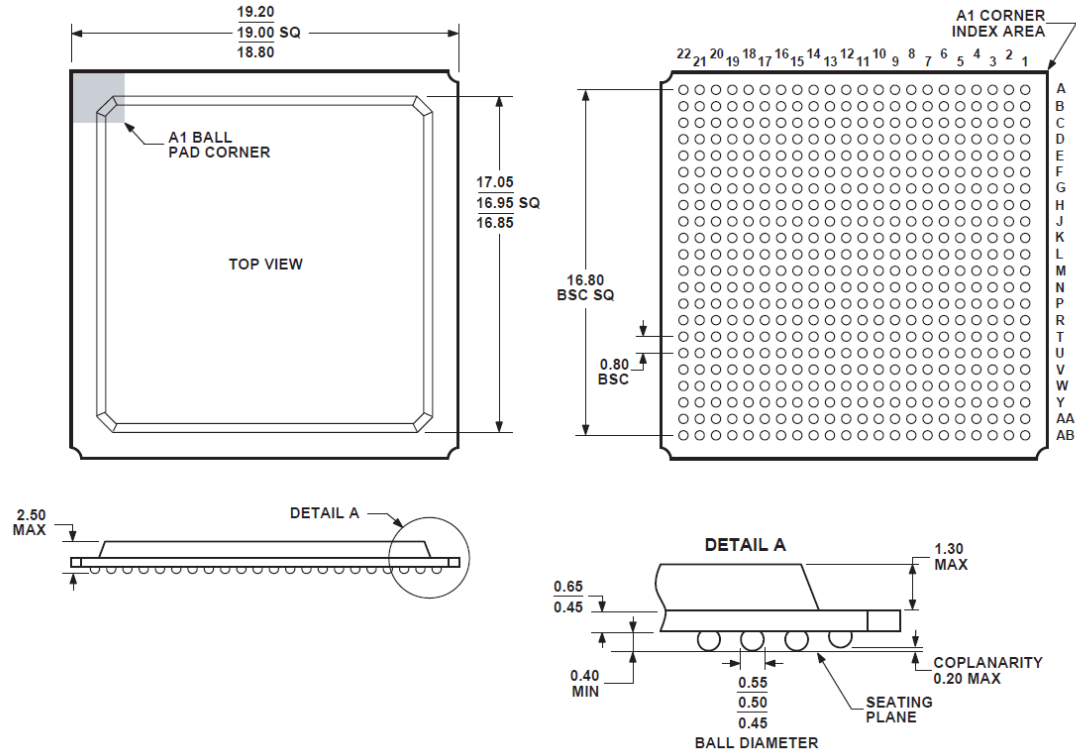
*COMPLIANT TO JEDEC STANDARDS MO-192-AAG-1
WITH EXCEPTION TO PACKAGE HEIGHT AND THICKNESS

CSP_BGA – BC-169-5
2.06mm Max Height

Package Outline Drawing Summary



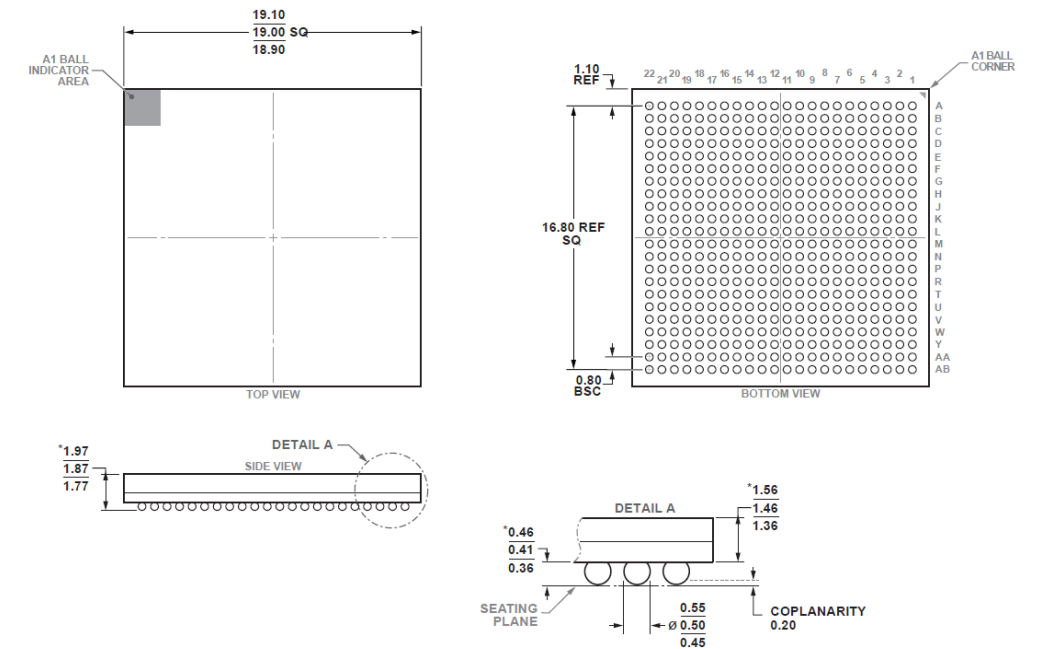
484-Ball Plastic Ball Grid Array [PBGA]
(B-484)
Dimensions shown in millimeters



PBGA – B-484
2.50mm Max Height



484-Ball Chip Scale Package Ball Grid Array [CSP_BGA]
(BC-484-1)
Dimensions shown in millimeters



CSP_BGA – BC-484-1
1.97mm Max Height