

March 30, 2012

Notification of changes

Transfer of the production process sputtering for selected PTC thermistors to Zhuhai

The production process sputtering (metallization of the ceramic disks) for some types of EPCOS PTC thermistors is being transferred from Šumperk, Czech Republic, to Zhuhai, China. Affected are all leaded PTC thermistors of the B59* series as well as other products whose back-end manufacture is based in Zhuhai (see Annex).

PTC heating elements, PTC motor-start thermistors (see UPtoDATE 120330THERM2 and PCN PPD 29/T116 of March 30, 2012) as well as PTC chip thermistors are not affected by this change.

Zhuhai is the manufacturing plant for leaded varistors and the back-end plant for leaded PTC thermistors.

Transfer schedule

Date	Description
July 2012	Start of dismantling of the affected production installations in Šumperk
October 2012	Qualification of the first production installations in Zhuhai and Start of first deliveries (after customer releases)
March 2013	Conclusion of release Manufacture of all products in Zhuhai

During a transitional period, products may be supplied from both plants. Stocks from the Šumperk plant may also continue to be shipped after completion of the transfer in March 2013.

Quality

During the transfer phase, quality responsibility remains in Šumperk. After ramp-up at the Zhuhai plant, this responsibility will be transferred to the new plant.

Enclosure Notification of changes (PCN)
List of all affected products

Contact Dr. Stefan Benkhof, PPD PTC PM, Munich

Customers are asked to address inquiries directly to their sales contacts.



**Product / Process Change Notification
Produkt-/ Prozess-Änderungsmitteilung**

1. ID No. / ID-Nr.: PPD 30/T116		2. Date of announcement / Datum der Ankündigung: March 30, 2012	
3. Type / Produktgruppe: PTC thermistors / PTC-Thermistoren	Old ordering code / Alte Bestell-Nr.: B59* List of all affected ordering codes is attached / Liste aller Bestellnummern anbei	New ordering code / Neue Bestell-Nr.: No change / keine Änderung	Customer part number / Kundensachnummer:
4. Description of change / Beschreibung der Änderung: <p>Transfer of the sputtering process step from Šumperk, Czech Republic, to our plant in Zhuhai, China, for all PTC thermistors with back-end production in Zhuhai. This mainly affects all leaded components, e.g. for overload protection and leaded sensors, but also encapsulated or housed SMD PTC thermistors. Sputtering for heating elements or PTC chip thermistors will not be transferred, so these products are not affected by this PCN. A complete list of affected materials is attached to this PCN. The process step remains unchanged during the transfer. Some sputtering capacity will be retained in Šumperk, so this production site will remain active as backup. /</p> <p>Verlagerung des Fertigungsschritts Sputtern von Šumperk/Tschechische Republik nach Zhuhai/China für alle PTC-Thermistoren mit Backend-Fertigung in Zhuhai. Dies betrifft alle bedrahteten PTC-Thermistoren, zum Beispiel Überlast PTC-Thermistoren und bedrahtete Sensoren, aber auch umspritzte SMD-PTC-Thermistoren und Gehäusevarianten. Das Sputtern von Heizelementen und Chip-PTC-Thermistoren wird nicht verlagert. Eine Liste aller betroffenen Bestellnummern ist anbei. Der Prozessschritt selbst wird im Verlauf der Verlagerung nicht verändert. An dem Standort in Šumperk werden einige Sputteranlagen belassen, so dass dieser Standort zur Absicherung der Fertigungskapazität dienen kann.</p>			
5. Effect on the product or for customers (quality, specification, lead time) / Auswirkung auf das Produkt oder für den Kunden (Qualität, Spezifikation, Lieferzeiten): <p>No change in appearance, function, quality, reliability or processability. / Keine Änderung von Aussehen, Funktion, Qualität, Zuverlässigkeit und Verarbeitbarkeit.</p>			



6. Quality assurance measures / Maßnahmen zur Qualitätssicherung:

- Phased transfer of the affected product range between July 2012 and March 2013
- Release of all affected processes and equipment in Zhuhai according to ISO/TS 16949
- Reliability testing of the products manufactured at the new location
- Intensive training program for the production personnel
- The Zhuhai facility is already a production site for leaded varistors and PTC thermistors
- Zhuhai is certified according to ISO/TS 16949
- Intensified process controls and outgoing inspections during the ramp-up phase /

- Schrittweise Verlagerung des betroffenen Produktspektrums von Juli 2012 bis März 2013
- Freigabe jedes einzelnen Prozesses bzw. Equipments in Zhuhai erfolgt gemäß ISO/TS 16949
- Zuverlässigkeitstests an den am neuen Standort gefertigten Bauelementen
- Intensives Schulungsprogramm des Fertigungspersonals
- Der Standort in Zhuhai ist bereits Fertigungsstandort von bedrahteten Varistoren und PTC Thermistoren
- Zhuhai ist gemäß ISO/TS 16949 zertifiziert
- Während des Hochlaufs verstärkte Prozesskontrollen und Ausgangsprüfungen

7. Scheduled date of introduction / Geplante Einführung:

Start of series production in October 2012, depending on customer release.
 Completion of transfer by March 2013./
 Beginn der Serienfertigung im Oktober 2012 für erste Produkte, entsprechend der Kundenfreigaben.
 Abschluß der Verlagerung März 2013.

8. Customer feedback / Rückmeldung vom Kunden:

If EPCOS does not receive notification to the contrary within a period of 10 weeks, EPCOS assumes that the customer agrees to the change. For an interim period we cannot rule out that old as well as new products will be shipped.
 Falls EPCOS innerhalb von 10 Wochen keine gegenteilige Mitteilung erhält, geht EPCOS davon aus, dass die geplante Änderung vom Kunden akzeptiert ist. Innerhalb einer Übergangszeit kann es vorkommen, dass sowohl alte wie auch neue Ware geliefert wird.

Quality Management:
 Name: Dr. Werner Pint

Signature
 sgd. Pint

Product Marketing:
 Tel: +49 89 636 28407
 Fax: +49 89 636 22540
 E-mail: stefan.benkhof@epcos.com
 Name: Dr. Stefan Benkhof

Signature
 sgd. Benkhof

Customer acknowledgement
 Bestätigung durch den Kunden

Signature



Electronic Parts and Components

**Annex of UPtoDATE 120330THERM1 and PPD 28/T116 of March 30, 2012 /
Transfer of the production process sputtering for selected PTC thermistors to Zhuhai**

Affected products

Ordering code			
B59001E1170B040	B59024S1120A151	B59069B1080B151	B59098U1170B070
B59001J1140B040	B59025C0120B070	B59069B1120A051	B59099U1080B070
B59001U1080B070	B59025S1120A070	B59069S0120B062	B59099U1100B070
B59001U1090B070	B59026U1130B070	B59070B1105B151	B59100A1060A040
B59001U1170B070	B59028C1080B053	B59070S1120B040	B59100A1070A040
B59002E1170B040	B59029C1110B051	B59073S0120B054	B59100A1080A040
B59002J1130B040	B59030C1120B070	B59076B1120B053	B59100A1090A040
B59002P1120B062	B59030D1150B040	B59076B1120B151	B59100A1100A040
B59004A1130B040	B59033U1145B070	B59076B1120B153	B59100A1105A040
B59005U1140B053	B59034S1120B070	B59076C1120A151	B59100A1110A040
B59008B1130A051	B59034S1145B070	B59076S1120B054	B59100A1115A040
B59008C0060A040	B59034S1155B070	B59078U1145B070	B59100A1120A040
B59008C0070A040	B59042B1120B151	B59078U1150B070	B59100A1125A040
B59008C0080A040	B59042U1155B070	B59078U1155B070	B59100A1130A040
B59008C0090A040	B59043A0191P040	B59080G1120B262	B59100A1135A040
B59008C0100A040	B59045B1120B151	B59081G1120A161	B59100A1140A040
B59008C0110A040	B59048B1080B151	B59081G1120B261	B59100A1145A040
B59008C0120A040	B59050D1100B040	B59082S1080B040	B59100A1150A040
B59008C0130A040	B59050D1120B040	B59082S1080B054	B59100A1155A040
B59008C0140A040	B59050U1120B053	B59082U1160B070	B59100A1160A040
B59008C0150A040	B59051U1160B070	B59083G1120A161	B59100A1170A040
B59008C0155A040	B59053C1120B151	B59083U1120B051	B59100A1180A040
B59008C0160A040	B59055C1100B140	B59084B1120A151	B59100A1190A040
B59008U1120B053	B59056U1135B051	B59084G1120A161	B59100C0010A070
B59010B1120A070	B59059U1120B051	B59084S1120B054	B59100C0050A070
B59010D1135B040	B59061S1090A370	B59085G1120A161	B59100C0060A070
B59010D1150B040	B59061S1090B370	B59086G1120B262	B59100C0070A070
B59011C1000A051	B59061S1095A370	B59086S1040B040	B59100C0080A054
B59011C1040A070	B59062B1080A151	B59086U1080B053	B59100C0080A070
B59011C1060A070	B59062B1080A155	B59087U1120B040	B59100C0090A051
B59011C1120A070	B59063C1105B151	B59087U1120B070	B59100C0090A054
B59011E0160A040	B59063S1080B070	B59088U1055A053	B59100C0090A070
B59012B1080A053	B59064C1040B070	B59088U1055B053	B59100C0100A051
B59012B1080B070	B59065S1120B054	B59088U1055B070	B59100C0100A070
B59015U1055B070	B59065S1120B070	B59089S1120B070	B59100C0110A051
B59018U1170B070	B59065S1120B270	B59091S1130B070	B59100C0110A070
B59020E1160A041	B59067S0160B070	B59092S1120B054	B59100C0120A070
B59020S1120B054	B59067S1070B054	B59092U1110B070	B59100C0130A070
B59022C0080B040	B59067S1080B054	B59094U1140B070	B59100C0140A070
B59022S1120A051	B59067S1090B054	B59095U1120B070	B59100C0150A151
B59023S1120A070	B59067U1140B070	B59095U1145B070	B59100M1060A070
B59023U1120B054	B59068U1120B055	B59098C1100B051	B59100M1070A070
	B59069B1080B051	B59098C1100B055	B59100M1080A070



Electronic Parts and Components

B59100M1090A070
B59100M1100A070
B59100M1110A070
B59100M1120A070
B59100M1130A070
B59100M1130B011
B59100M1140A070
B59100M1145A070
B59100M1150A070
B59100M1155A070
B59100M1160A070
B59100M1170A070
B59100M1180A070
B59100M1190A070
B59101C1120A051
B59101P1080A062
B59101P1120A062
B59101S1155B070
B59101U1145B070
B59102S1160B070
B59105J0130A020
B59107J0130A020
B59109J0130A020
B59115P1080A062
B59115P1120A062
B59115S1100B054
B59118C1080A051
B59118C1080A053
B59118C1080A070
B59118C1120A051
B59118C1120A070
B59119C1080A070
B59119C1120A051
B59119C1120A070
B59120U1140B070
B59121B1120A070
B59121U1160B070
B59122C1080A070
B59122S1120A051
B59122U1160B070
B59123U1130B070
B59124U1120B070
B59126U0120B070
B59126U0160B070
B59129S1110B040
B59130S1120A054
B59130U1080B070
B59130U1090B070
B59130U1100B070

B59130U1110B070
B59130U1120B070
B59130U1140B070
B59130U1150B070
B59130U1155B070
B59130U1160B070
B59130U1170B070
B59130U1180B070
B59131U1135B070
B59132U1120B070
B59133U1110B070
B59135M0120A070
B59135M0150A070
B59140U1130B070
B59140U1145B070
B59140U1155B070
B59141U1130B070
B59141U1145B070
B59141U1155B070
B59142U0120B053
B59145S1100A054
B59148U0120B057
B59148U1170B070
B59150U0160B053
B59150U1140B040
B59151S1160B040
B59151U1110B070
B59151U1130B070
B59151U1140B070
B59151U1160B070
B59151U1180B070
B59154C1130A151
B59154C1130B151
B59154U1135B151
B59155A0160A040
B59155A0170A040
B59155A0180A040
B59155M0140A070
B59155M0145A070
B59155M0150A070
B59162S1080B054
B59164U1120B070
B59168S1120B070
B59170S1120B054
B59171U0120B070
B59173C1130A151
B59176S1100B054
B59179U0120B070
B59181S1120B070

B59184B1120A151
B59184C1120A051
B59184C1120B140
B59184C1120B153
B59184C1130A151
B59185S1120B054
B59193U0120B051
B59196S1120B040
B59196U0120B051
B59200A1110A040
B59201P1080A062
B59201P1120A062
B59203S1060B140
B59204U0120B053
B59204U0160B053
B59207U0120B051
B59207U0160B051
B59208U1070B040
B59213U0120B051
B59215P1080A062
B59215P1120A062
B59222U1160B070
B59228U0120B070
B59235U1120B051
B59241U0120B051
B59248B1080B153
B59251U1080B051
B59251U1080B070
B59252U1080B070
B59268S1075A070
B59274U0160B053
B59300M1060A070
B59300M1080A070
B59300M1090A070
B59300M1100A070
B59300M1110A070
B59300M1120A070
B59300M1130A070
B59300M1140A070
B59300M1145A070
B59300M1150A070
B59300M1155A070
B59300M1160A070
B59300M1170A070
B59300M1180A070
B59300M1190A070
B59301P1080A062
B59301P1120A062
B59303M1110B070

B59305B1140B051
B59306B1160B051
B59310B1110A051
B59310U1130B070
B59310U1140B070
B59310U1150B070
B59310U1160B070
B59310U1180B070
B59311U1110B070
B59312U1140B070
B59312U1150B070
B59312U1160B070
B59313U1140B070
B59313U1150B070
B59313U1160B070
B59313U1180B070
B59314U1140B070
B59314U1160B070
B59314U1180B070
B59315P1080A062
B59315P1120A062
B59339A1201P020
B59339A1202P020
B59339A1321P020
B59339A1322P020
B59339A1501P020
B59339A1502P020
B59339A1800P020
B59339A1801P020
B59346A1502P020
B59351U1160B070
B59380S1120B054
B59404B0060A040
B59405B1060A040
B59406B0060A040
B59407B0030A040
B59409S1060B140
B59412C1130B070
B59450C1080B051
B59450T1120A062
B59451C1130A040
B59451C1130A070
B59451C1130B070
B59509T1120A062
B59510T1120A062
B59525T1120A062
B59534S1120B110
B59535T1120A062
B59535T1120A262



Electronic Parts and Components

B59550T1120A062
B59550T1120A262
B59563J0060A110
B59585B1150A070
B59601B1120B157
B59603B1120B157
B59635T1120A062
B59636B1120B151
B59650T1120A062
B59709J0060A110
B59709T0060B110
B59725T1120A062
B59735T1120A062
B59750B0120A070
B59750T1120A062
B59751B0120A051
B59751B0120A070
B59751B0120B070
B59751C0120A070
B59751U0120A040
B59752B0120A070
B59753B0120A070
B59754B0120A070
B59755B0115A070
B59755C0115A070
B59758B0110A070
B59758B0110A071
B59758C0110A070
B59770B0120A070
B59770B0120B040
B59771B0120A070
B59772B0120A070
B59773B0120A070
B59774B0115A070
B59774C0115A070
B59801D0060A040
B59801D0080A040
B59801D0090A040
B59801D0100A040
B59801D0110A040
B59801D0120A040
B59805T1080A062
B59810C0080A070
B59810C0120A070
B59810C0130A070
B59810C0160A070
B59810T1120A062
B59811C0135A070
B59825T1120A062

B59830C0080A070
B59830C0120A070
B59830C0130A040
B59830C0130A070
B59830C0160A070
B59831C0135A070
B59835T1120A062
B59840C0080A054
B59840C0080A070
B59840C0120A070
B59840C0130A040
B59840C0130A070
B59840C0160A051
B59840C0160A070
B59841C0135A040
B59841C0135A070
B59850C0080A070
B59850C0120A051
B59850C0120A070
B59850C0120A370
B59850C0120A570
B59850C0130A051
B59850C0130A070
B59850C0160A070
B59850T1120A062
B59851C0135A051
B59851C0135A070
B59851C1120A370
B59860C0080A070
B59860C0120A051
B59860C0120A054
B59860C0120A070
B59860C0120A370
B59860C0120A554
B59860C0120A570
B59860C0130A040
B59860C0130A054
B59860C0130A070
B59860C0160A051
B59860C0160A070
B59861C0135A051
B59861C0135A070
B59861C1120A070
B59870C0080A051
B59870C0080A070
B59870C0120A051
B59870C0120A054
B59870C0120A070
B59870C0120A370

B59870C0120A470
B59870C0130A051
B59870C0130A070
B59870C0160A051
B59870C0160A070
B59870C1120B151
B59870C1120B951
B59870C1120B970
B59871C0135A070
B59871C1120A070
B59872B0120A070
B59872C0120A051
B59872C0120A070
B59873C0120A051
B59873C0120A052
B59873C0120A070
B59873C0120A570
B59874C0120A051
B59874C0120A070
B59875C0120A051
B59875C0120A070
B59875C0120A570
B59875T1120A062
B59875U1120B051
B59880C0080A051
B59880C0080A070
B59880C0120A051
B59880C0120A054
B59880C0120A070
B59880C0120A370
B59880C0120A570
B59880C0120B070
B59880C0130A070
B59880C0160A054
B59880C0160A070
B59881C0135A051
B59881C0135A070
B59883C0120A051
B59883C0120A070
B59883C0120A370
B59883C0120A554
B59883C0120A570
B59883C0120B070
B59884C0120A051
B59884C0120A054
B59884C0120A055
B59884C0120A070
B59885C0080A051
B59885C0120A051

B59885C0120A054
B59885C0120A070
B59886C0060A070
B59886C0060A270
B59886C0120A051
B59886C0120A070
B59890C0080A051
B59890C0080A054
B59890C0080A070
B59890C0120A051
B59890C0120A054
B59890C0120A070
B59890C0120A151
B59890C0120B070
B59890C0160A070
B59890S1120B154
B59890T0060B110
B59890T0060B210
B59890U0120A051
B59891C0135A053
B59891C0135A070
B59901D0060A040
B59901D0070A040
B59901D0080A040
B59901D0090A040
B59901D0100A040
B59901D0110A040
B59901D0120A040
B59901D0130A040
B59910C0120A070
B59910C0130A070
B59910C0160A070
B59915C0120A070
B59930C0080A070
B59930C0120A070
B59930C0130A070
B59930C0160A051
B59930C0160A070
B59935C0120A051
B59935C0120A070
B59940C0080A051
B59940C0080A070
B59940C0120A054
B59940C0120A070
B59945C0120A051
B59945C0120A070
B59945C0160A051
B59945C0160A070
B59950C0080A051



Electronic Parts and Components

B59950C0080A070
B59950C0120A051
B59950C0120A070
B59950C0130A070
B59950C0160A070
B59955C0120A051
B59955C0120A070
B59955C0160A051
B59955C0160A070
B59960C0080A070
B59960C0120A051
B59960C0120A054
B59960C0120A070
B59960C0130A070
B59960C0160A070
B59965C0120A051

B59965C0120A070
B59965C0160A051
B59965C0160A070
B59970C0080A051
B59970C0080A053
B59970C0080A070
B59970C0120A051
B59970C0120A070
B59970C0120B051
B59970C0130A070
B59970C0160A051
B59970C0160A070
B59970T1100A062
B59973C0120A070
B59975C0120A051
B59975C0120A070

B59975C0160A051
B59975C0160A070
B59980C0080A051
B59980C0080A070
B59980C0120A051
B59980C0120A070
B59980C0130A070
B59980C0160A070
B59983C0120A070
B59985B0120A054
B59985C0120A051
B59985C0120A070
B59985C0120B051
B59985C0160A051
B59985C0160A070
B59990B0080A054

B59990C0080A051
B59990C0080A070
B59990C0120A051
B59990C0120A054
B59990C0120A070
B59990C0160A051
B59990C0160A070
B59995C0120A051
B59995C0120A054
B59995C0120A070
B59995C0120B054
B59995C0160A051
B59995C0160A070