



SOT758-6(DD)

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple wettable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

25 November 2020

Package information

1 Package summary

Terminal position code	Q (quad)
Package type descriptive code	HVQFN16
Package type industry code	HVQFN16
Package style descriptive code	HVQFN (thermal enhanced very thin quad flatpack; no leads)
Package body material type	P (plastic)
Mounting method type	S (surface mount)
Issue date	15-10-2020
Manufacturer package code	98ASA01679D

Table 1. Package summary

Parameter	Min	Nom	Max	Unit
package length	2.9	3	3.1	mm
package width	2.9	3	3.1	mm
package height	0.8	0.85	1	mm
nominal pitch	-	0.5	-	mm
actual quantity of termination	-	16	-	



HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple wettable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

2 Package outline

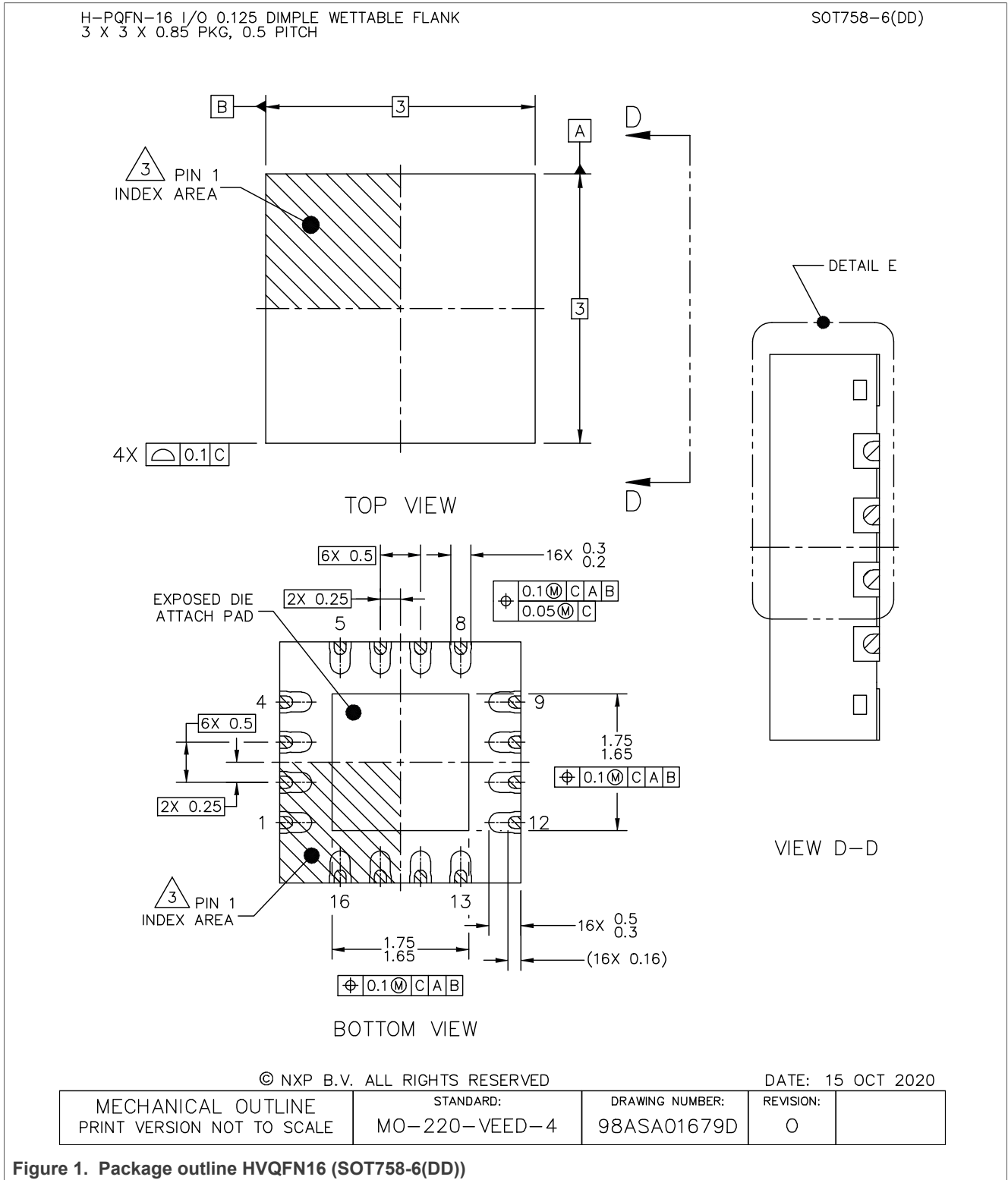
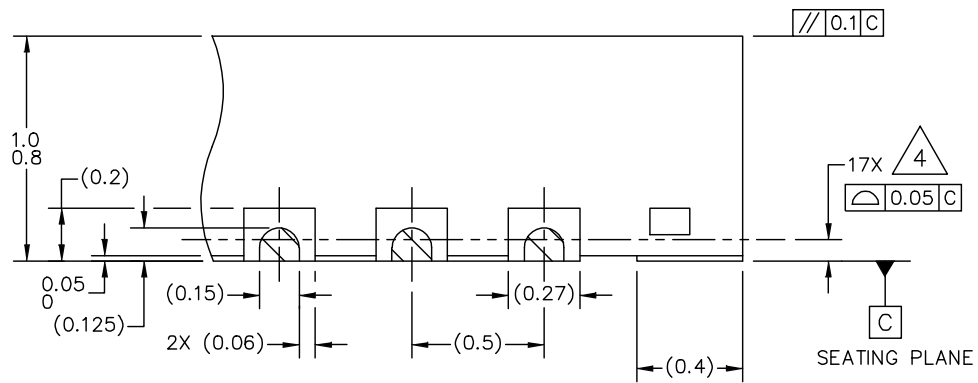


Figure 1. Package outline HVQFN16 (SOT758-6(DD))

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple wettability flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

H-PQFN-16 I/O 0.125 DIMPLE WETTABILITY FLANK
3 X 3 X 0.85 PKG, 0.5 PITCH

SOT758-6(DD)



DETAIL E
VIEW ROTATED 90° CW

© NXP B.V. ALL RIGHTS RESERVED

DATE: 15 OCT 2020

MECHANICAL OUTLINE PRINT VERSION NOT TO SCALE	STANDARD: MO-220-VEED-4	DRAWING NUMBER: 98ASA01679D	REVISION: 0	
--	----------------------------	--------------------------------	----------------	--

Figure 2. Package outline detail of HVQFN16 (SOT758-6(DD))

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple wetable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

3 Soldering

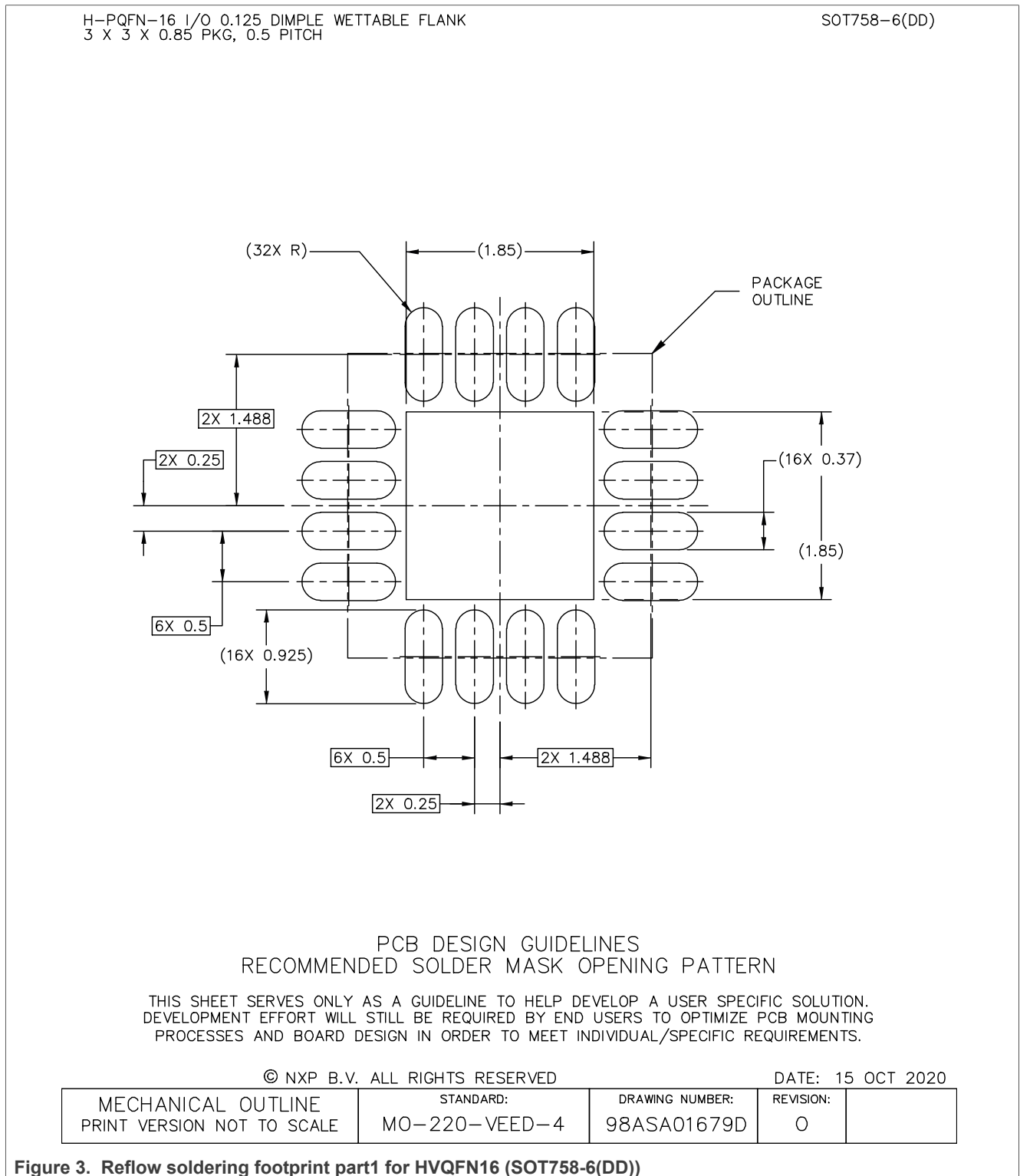
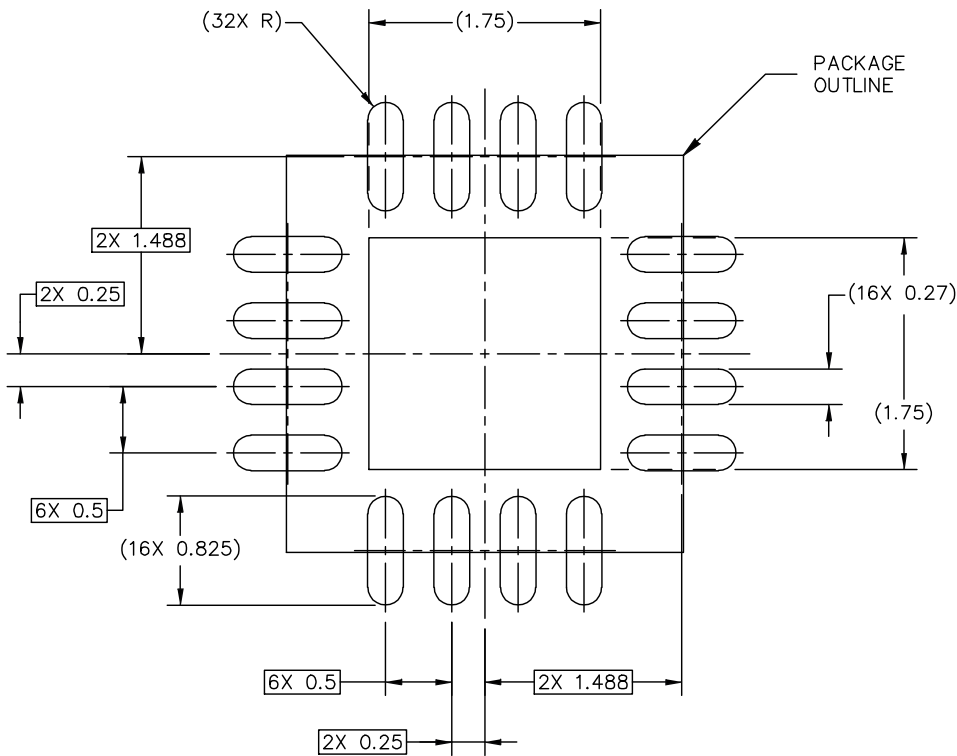


Figure 3. Reflow soldering footprint part1 for HVQFN16 (SOT758-6(DD))

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple wettable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

H-PQFN-16 I/O 0.125 DIMPLE WETTABLE FLANK
3 X 3 X 0.85 PKG, 0.5 PITCH

SOT758-6(DD)



PCB DESIGN GUIDELINES
RECOMMENDED I/O PADS AND SOLDERABLE AREA

THIS SHEET SERVES ONLY AS A GUIDELINE TO HELP DEVELOP A USER SPECIFIC SOLUTION. DEVELOPMENT EFFORT WILL STILL BE REQUIRED BY END USERS TO OPTIMIZE PCB MOUNTING PROCESSES AND BOARD DESIGN IN ORDER TO MEET INDIVIDUAL/SPECIFIC REQUIREMENTS.

© NXP B.V. ALL RIGHTS RESERVED

DATE: 15 OCT 2020

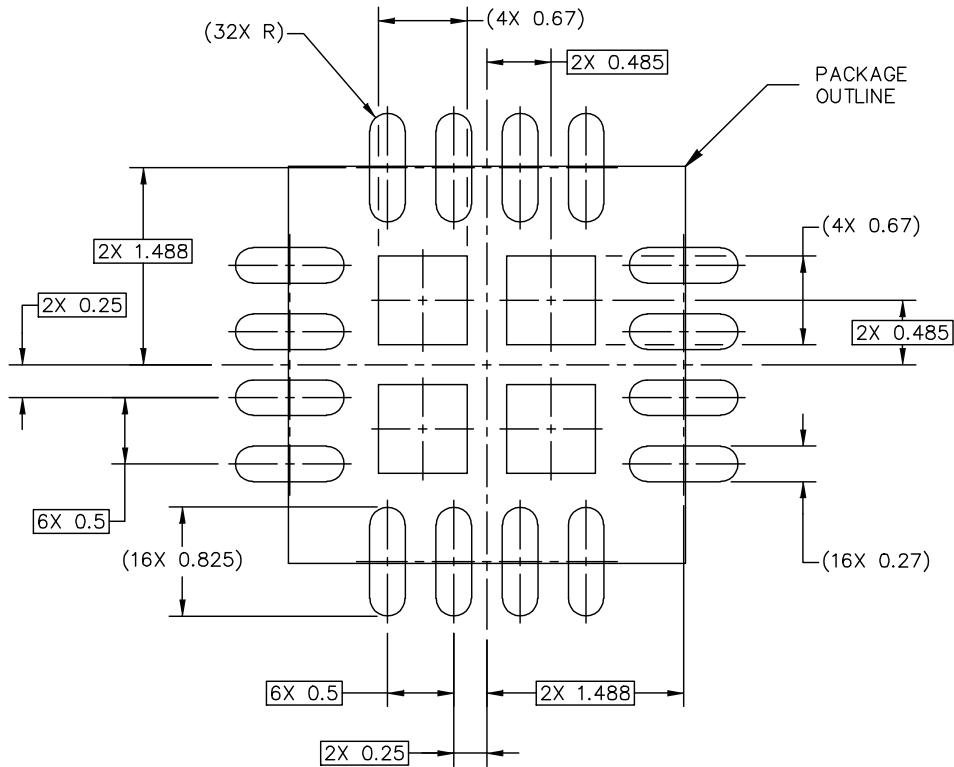
MECHANICAL OUTLINE PRINT VERSION NOT TO SCALE	STANDARD: MO-220-VEED-4	DRAWING NUMBER: 98ASA01679D	REVISION: 0	
--	----------------------------	--------------------------------	----------------	--

Figure 4. Reflow soldering footprint part2 for HVQFN16 (SOT758-6(DD))

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple wetable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

H-PQFN-16 I/O 0.125 DIMPLE WETTABLE FLANK
3 X 3 X 0.85 PKG, 0.5 PITCH

SOT758-6(DD)



RECOMMENDED STENCIL THICKNESS 0.125 OR 0.150

PCB DESIGN GUIDELINES – RECOMMENDED SOLDER PASTE STENCIL

THIS SHEET SERVES ONLY AS A GUIDELINE TO HELP DEVELOP A USER SPECIFIC SOLUTION. DEVELOPMENT EFFORT WILL STILL BE REQUIRED BY END USERS TO OPTIMIZE PCB MOUNTING PROCESSES AND BOARD DESIGN IN ORDER TO MEET INDIVIDUAL/SPECIFIC REQUIREMENTS.

© NXP B.V. ALL RIGHTS RESERVED

DATE: 15 OCT 2020

MECHANICAL OUTLINE PRINT VERSION NOT TO SCALE	STANDARD: MO-220-VEED-4	DRAWING NUMBER: 98ASA01679D	REVISION: 0	
--	----------------------------	--------------------------------	----------------	--

Figure 5. Reflow soldering footprint part3 for HVQFN16 (SOT758-6(DD))

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple
wetable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

H-PQFN-16 I/O 0.125 DIMPLE WETTABLE FLANK
3 X 3 X 0.85 PKG, 0.5 PITCH

SOT758-6(DD)

NOTES:

1. ALL DIMENSIONS ARE IN MILLIMETERS.
2. DIMENSIONING AND TOLERANCING PER ASME Y14.5M-1994.
3. PIN 1 FEATURE SHAPE, SIZE AND LOCATION MAY VARY.
4. COPLANARITY APPLIES TO LEADS, DIE ATTACH FLAG.
5. MIN. METAL GAP FOR LEAD TO EXPOSED PAD SHALL BE 0.15 MM.

© NXP B.V. ALL RIGHTS RESERVED

DATE: 15 OCT 2020

MECHANICAL OUTLINE PRINT VERSION NOT TO SCALE	STANDARD: MO-220-VEED-4	DRAWING NUMBER: 98ASA01679D	REVISION: 0	
--	----------------------------	--------------------------------	----------------	--

Figure 6. Package outline note HVQFN16 (SOT758-6(DD))

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple wettable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

4 Legal information

Disclaimers

Limited warranty and liability — Information in this document is believed to be accurate and reliable. However, NXP Semiconductors does not give any representations or warranties, expressed or implied, as to the accuracy or completeness of such information and shall have no liability for the consequences of use of such information. NXP Semiconductors takes no responsibility for the content in this document if provided by an information source outside of NXP Semiconductors.

In no event shall NXP Semiconductors be liable for any indirect, incidental, punitive, special or consequential damages (including - without limitation - lost profits, lost savings, business interruption, costs related to the removal or replacement of any products or rework charges) whether or not such damages are based on tort (including negligence), warranty, breach of contract or any other legal theory.

Notwithstanding any damages that customer might incur for any reason whatsoever, NXP Semiconductors' aggregate and cumulative liability towards customer for the products described herein shall be limited in accordance with the Terms and conditions of commercial sale of NXP Semiconductors.

Right to make changes — NXP Semiconductors reserves the right to make changes to information published in this document, including without limitation specifications and product descriptions, at any time and without notice. This document supersedes and replaces all information supplied prior to the publication hereof.

HVQFN16, thermal enhanced very thin quad flat package, no leads, 16 terminals, 0.125 mm dimple
wetable flank, 0.5 mm pitch, 3 mm x 3 mm x 0.85 mm body

Contents

1 Package summary1
2 Package outline2
3 Soldering4
4 Legal information8