



MIFARE® contactless tag IC family overview

Product features		MIFARE Ultralight®			MIFARE Classic®			MIFARE Plus®			MIFARE DESFire®		
		Nano	EVT	C	EVT	S	SE	X	EVT	EVT	EVT	EVT	
RF Interface	Protocol	ISO/IEC 14443-3			7-byte UID			ISO/IEC 14443-3 & 4			ISO/IEC 14443-4		
UID – unique Identifier	UID	7-byte UID			106 Kbps			7-byte UID, 4-byte NUID, Random ID			7-byte UID, Random ID		
Communication speed	Memory size [bytes]	40	48	128	144	1K	4K	2K	4K	2K	4K	8K	
Memory model	Memory model	Compact, 4-byte page			Compact, Sectors & 16-byte block			Compact, Sectors & 16-byte block			Flexible file system		
Crypto	TODES	112-bit			Crypto-1			Crypto-1, AES			DES / 3DES / 3XDES / AES		
Key length	Key length	112-bit			48-bit Crypto-1			48-bit Crypto-1, 128-bit AES			128-bit AES, up to 168-bit DES		
Authentication	Authentication	Password			Encrypted			Plain CMACd, Encrypted w. CMAC			Plain CMACd, Encrypted w. CMAC		
Communication security	Communication security	Encrypted			Encrypted			Plain CMACd, Encrypted w. CMAC			Plain CMACd, Encrypted w. CMAC		
Miscardapp	Miscardapp	-			-			-			-		
Transaction MAC	Transaction MAC	-			-			-			-		
Multi key sets	Multi key sets	-			-			-			-		
Proximity check	Proximity check	-			-			-			-		
Virtual card select	Virtual card select	-			-			-			-		
Originality check features	Originality check features	-			-			-			-		
CC Certification	CC Certification	-			-			-			-		
ISO 7816-4 APOU	ISO 7816-4 APOU	-			-			-			-		
NFC compliance	NFC forum tag type 2 compliant	-			-			-			-		
Public transport & event ticketing	Public transport & event ticketing	-			-			-			-		
Loyalty programs, limited use tickets	Loyalty programs, limited use tickets	-			-			-			-		
Input capacitance [pF]	Input capacitance [pF]	17 / 50			17			17			17 / 70		
Multi applications	Multi applications	supported via MAD			supported via MAD			supported via MAD			dynamic		
Delivery types – 7-byte UID													
Wafer 120µm / 17 pF	Wafer 120µm / 17 pF	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
Wafer 120µm / high cap	Wafer 120µm / high cap	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
Wafer 75 µm / 17pF	Wafer 75 µm / 17pF	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
Wafer 75 µm / high cap	Wafer 75 µm / high cap	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
MO44 / 17pF	MO44 / 17pF	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
MO44 / high cap	MO44 / high cap	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
MO48 / 17 pF	MO48 / 17 pF	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
MO48 / high cap	MO48 / high cap	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
MO86 / 17pF	MO86 / 17pF	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201
MO86 / high cap	MO86 / high cap	MIFARE001	MIFARE1151	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201	MIFARE1201

¹⁾ available also in legacy 4 Byte NUID

MIFARE, MIFARE Ultralight®, MIFARE Classic, MIFARE Plus and MIFARE DESFire are registered trademarks of NXP B.V.

MIFARE and NFC reader/writer IC solutions

Product	NFC frontend solutions				NFC controller solutions				HITAG
	MFK532	MFK523	MFRG30	MFRG31	CLRC663	PN512	PN5180	PN532	
Standards	Standard 3V ISO/IEC 14443A, MIFARE frontend	Standard 3V ISO/IEC 14443 MIFARE frontend	High-performance ISO/IEC 14443 MIFARE	High-performance ISO/IEC 14443 MIFARE	High-performance multi-protocol NFC frontend	Fully NFC forum compliant	High-performance multi-protocol NFC forum-compliant	NFC controller with integrated FW	High-performance multi-protocol NFC controller
Integrated microcontroller	–	–	–	–	–	–	–	–	–
Center frequency (MHz)	13.56	13.56	13.56	13.56	13.56	13.56	13.56	13.56	13.56 (1)
Standards & protocols									
Reader / writer	ISO/IEC 14443 A	ISO/IEC 14443	ISO/IEC 14443 A	ISO/IEC 14443 A	ISO/IEC 18092 ISO/IEC 14443 ISO/IEC 15693 Felica	ISO/IEC 18092 ISO/IEC 14443 ISO/IEC 15693 Felica	ISO/IEC 18092 ISO/IEC 14443 ISO/IEC 15693 Felica	ISO/IEC 18092 ISO/IEC 14443 ISO/IEC 15693 Felica	ISO/IEC 18092 ISO/IEC 14443 ISO/IEC 15693 Felica
NFC tag type support	1, 2, 4	1, 2, 4	1, 2, 4	1, 2, 4	1, 2, 3, 4	1, 2, 3, 4	1, 2, 3, 4	1, 2, 3, 4	1, 2, 3, 4
ISO/IEC 14443 Baud-rate (KBit/s)	106/212/424/848	106/212/424/848	106/212/424/848	106/212/424/848	106/212/424/848	106/212/424	106/212/424/848	106/212/424/848	106/212/424/848
Felica Baud-rate (KBit/s)	–	–	–	–	–	–	–	–	–
MIFARE Classic support (license included)	–	–	–	–	–	–	–	–	–
ISO/IEC 15693 Baud-rate (KBit/s)	–	–	–	–	–	–	–	–	–
EPIC Class 1 HF ISO/IEC 18093-3M3	–	–	–	–	–	–	–	–	–
EMV Co compliance	–	–	–	–	–	–	–	–	–
Card emulation	–	–	–	–	–	–	–	–	–
NFC tag type emulation	–	–	–	–	–	–	–	–	–
NFC tag type Baud-rate (KBit/s)	–	–	–	–	–	–	–	–	–
Peer-to-peer (ISO/IEC 18093)	–	–	–	–	–	–	–	–	–
Passive communication	–	–	–	–	–	–	–	–	–
Active communication	–	–	–	–	–	–	–	–	–
Product features									
Operating distance up to (mm)	70	70	120	120/160	70	120/160	70	70	120/160
RF transmitter supply voltage [V]	3.6	3.6	3.3 to 5	3.3 to 5	3.6	3.6	2.5 to 3.6	3.1	3.3 to 5
Transmitter supply current, typ [mA]	100	100	250	250	100	250	60	60	200
Host interface	SPI, I ² C, UART	SPI, I ² C, UART	SPI, I ² C, UART	SPI, I ² C, UART	SPI, I ² C, UART	SPI, I ² C, UART	SPI, I ² C, UART	PC	SPI, I ² C, UART
Supply voltage host interface [V]	2.5 to 3.6	2.5 to 3.6	3.3 to 5.0	3.3 to 5.0	2.5 to 3.6	1.8 to 3.3	2.5 to 3.6	1.8 to 3.3	3.3 to 5.0
Idle mode current, typ [µA]	5	5	0.008	0.008	6	2-8µA	–	–	6
Power-down mode current, typ [µA]	–	–	–	–	–	–	–	–	–
Power-down mode with RF feed detector on [µA]	–	–	–	–	–	–	–	–	–
Low-power and detection mode [µA]	–	–	–	–	–	–	–	–	–
Temperature range [°C]	–25 to +85	–25 to +85	–25 to +85	–25 to +85	–30 to +85	–30 to +85	–25 to +85	–30 to +85	–25 to +70
Security features									
MIFARE – SAM support in X-mode	–	–	–	–	–	–	–	–	–
MIFARE Classic security (CRYPTO HW)	–	–	–	–	–	–	–	–	–
Product support & ordering information									
Package	HQFN32	HQFN32	HQFN32	HQFN32	HQFN32	HQFN32	HQFN32	HQFN32	QFP100
Product type	MFK53220HM1	MFK53202HM1	MFK53202HM1	MFK53202HM1	MFK53202HM1	MFK53202HM1	MFK53202HM1	MFK53202HM1	MFK53202HM1
Software	–	–	–	–	–	–	–	–	–
NFC Reader Library	–	–	–	–	–	–	–	–	–
NFC Forum reference implementation	–	–	–	–	–	–	–	–	–
other	–	–	–	–	–	–	–	–	–

MIFARE embedded card functionality on SmartMX®

Product	MIFARE implementations		Features			MIFARE select	
	Available card IC functionality		UID options		Parameters		Exit on
PSCx145	C0128C081	MIFARE DESFire EV1 8K	7Byte UID	48Byte NUID	48Byte Random ID	Time out UART RF-Field	
		MIFARE DESFire EV1 4K					
		MIFARE DESFire EV1 2K					
		MIFARE Plus X 4K					
	C0021C016	MIFARE Plus X 2K					
		MIFARE Classic 4K					
		MIFARE Classic 1K					
	C0021VID						
	PSCx144						
C0020C012							
PSCx145							
C0128							
P600144H							
P600080H							
P6000724H							
P600144D							
P600080D							
P6000724D							
P600144I							
P600080I							



NFC tag IC family overview – 13.56 MHz (HF)

Product features	NTAG® 210p	NTAG® 210	NTAG® 212	NTAG® 213 / 213F	NTAG® 215	NTAG® 216 / 216F	NTAG® 1C 1K	NTAG® 1C 2K	NTAG® 1C plus 1K	NTAG® 1C plus 2K
Memory										
NFC Forum Type	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag	NFC Type 2 Tag
EEPROM size (byte)	80 (20 pages 4 byte)	80 (20 pages 4 byte)	164 (41 pages 4 byte)	180 (45 pages 4 byte)	540 (135 pages 4 byte)	924 (231 pages 4 byte)	1024	2048	1024	2048
User memory (byte)	48	48	128	144	504	888	888	1904	888	1912
Write endurance (cycles)	100,000	100,000	100,000	100,000	100,000	100,000	200,000	200,000	500,000	500,000
Data retention (yrs)	10	10	10	10	10	10	20	20	20	20
RF interface										
According to	ISO 14443A (up to layer 3)	ISO 14443A (up to layer 3)	ISO 14443A (up to layer 3)	ISO 14443A (up to layer 3)	ISO 14443A (up to layer 3)	ISO 14443A (up to layer 3)	ISO 14443A (up to layer 3)	ISO 14443A (up to layer 3)	ISO 14443A 1-3	ISO 14443A 1-3
NFC Forum Type 1 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag	NFC Forum Type 2 Tag
Frequency [MHz]	13.56	13.56	13.56	13.56	13.56	13.56	13.56	13.56	13.56	13.56
Band rate [Kbit/s]	106	106	106	106	106	106	106	106	106	106
Anticollision	bit-wise	bit-wise	bit-wise	bit-wise	bit-wise	bit-wise	bit-wise	bit-wise	bit-wise	bit-wise
Security										
Access keys	7, cascaded	7, cascaded	7, cascaded	7, cascaded	7, cascaded	7, cascaded	7, cascaded	7, cascaded	32 bit	32 bit
Access conditions	-	write, read and write	write, read and write	read, read and write	read, read and write	read, read and write	read, read and write	read, read and write	blockwise	read, read and write
Write protection	-	blockwise	blockwise	blockwise	blockwise	blockwise	blockwise	blockwise	blockwise	blockwise
Security	-	password	password	password	password	password	password	password	password	password
Special features										
Field detection pin	-	-	-	✓ ¹ (configurable)	-	✓ ¹ (configurable)	✓ (configurable)	✓ (configurable)	✓ (configurable)	✓ (configurable)
1C interface	• Originality check with customizable (re-programmable) originality signature	• UID ASCII minor	• UID ASCII minor	• UID ASCII minor	• UID ASCII minor	• UID ASCII minor	• UID ASCII minor	• UID ASCII minor	• Passthrough mode via 64 bytes SRAM	• Passthrough mode via 64 bytes SRAM
Others	• Originality check	• Originality check	• Originality check	• NFC counter	• NFC counter	• NFC counter	• NFC counter	• NFC counter	• Energy harvesting	• Energy harvesting
	• Fast Read	• Fast Read	• Fast Read	• Originality check	• Originality check	• Originality check	• Originality check	• Originality check	• Energy harvesting	• Energy harvesting
	• Fast Read	• Fast Read	• Fast Read	• Fast Read	• Fast Read	• Fast Read	• Fast Read	• Fast Read	• Fast Read	• Fast Read
	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹	• Sleep mode via FD pin ¹
Packages & capacitance types										
Sawn wafer (Au Bumped)	HT12L011G00UD	NT2L011G00UD	-	NT2H131G00UD	NT2H151G00UD	NT2H161G00UD	NT3H110TW0FUG	NT3H120TW0FUG	NT3H211TW0FUG	NT3H211TW0FUG
HSQ04 (SOT1192-1)	-	-	-	NT3H131F10D1.1	-	NT3H161F10D1.1	-	-	-	-
XDR8	-	-	-	-	-	-	NT3H110F1HK	NT3H120F1HK	NT3H211TW0FHK	NT3H211TW0FHK
TSSP8	-	-	-	-	-	-	NT3H110F1ET	NT3H120F1ET	NT3H211TW0FET	NT3H211TW0FET
MD8	1750	17	17	50	50	50	50	50	50	50

¹ NTAG 21x F version only

NTAG is a registered trademark of NXP B.V.



Low frequency IC family overview – 100-150 KHz (LF)

Product features	HITAG® 1	HITAG® 2	HITAG® S 256	HITAG® S 2048	HITAG® µ	HITAG® µ Advanced	HITAG® µ Advanced +	HITAG® RO
Memory								
Size [bit]	2048	256	256	2048	128	512	1760	64
Write endurance (cycles)	100,000	100,000	100,000	100,000	100,000	100,000	100,000	-
Data retention (yrs)	10	10	10	10	10	10	10	10
Organisation	64 blocks 4 bytes	8 blocks 4 bytes	8 blocks 4 bytes	64 blocks 4 bytes	4 blocks 4 bytes	16 blocks 4 bytes	55 blocks 4 bytes	2 blocks 4 bytes
RF interface								
According to	HITAG 1	HITAG 2	HITAG 1+	HITAG 1+	ISO 11784/85	ISO 11784/85	ISO 11784/85	-
Frequency	100-150 KHz	ISO 11784/85	ISO 11784/85	ISO 11784/85	100-150 KHz	100-150 KHz	100-150 KHz	100-150 KHz
Band rate [Kbit/s]	up to 4	up to 4	up to 4	up to 8	up to 8	up to 8	up to 8	-
Anti-collision	-	collision detection	-	collision detection	-	collision detection	-	-
Security								
Unique ID [byte]	4	4	4	4	6	6	6	5
Access keys	32 bit	48 bit	48 bit	48 bit	32 bit	32 bit	32 bit	-
Access conditions	Encrypted mutual authentication or plain	Authentication or plain	Authentication or plain	Authentication or plain	Plain, password	Plain, password	Plain, password	-
Encryption algorithm	✓	✓	✓	for authentication only	-	-	-	-
Special features								
TTC modes	-	✓	✓	✓	✓	✓	✓	✓
RF modes	✓	✓	✓	✓	✓	✓	✓	✓
Write ISO 11785	-	-	-	-	✓	✓	✓	-
Delivery types								
Sawn wafer (Au Megabump)	-	-	HIS IC C56 01EW/C7	HIS IC C48 01EW/C7	-	✓	✓	✓
Sawn wafer (Au bump)	HT1 IC S30 02W/V6F	HT2 IC S30 02W/V6F	HIS IC H56 01EW/V7	HIS IC H48 01EW/V7	-	-	-	-
MD4	HT1 MQ4A S30 E3/R	HT2 MQ4A S20 E3/R	HIS MD H56 02EV	HIS MD H48 02EV	-	-	-	-
SOT35-1 (Sick)	-	-	HT2 DC20 S20 F/R	-	-	-	-	-
SOT122	-	-	-	-	HIMS001F1FAE	HIMS101F1FAE	HIMS201F1FAE	-
HMS012	-	-	-	HIS H56 01 ETK	HIMS001F1FAE	HIMS101F1FAE	HIMS201F1FAE	-
Capacitance 210pF +/- 10%	✓	✓	-	-	-	-	-	-
Capacitance 210pF +/- 5%	-	-	✓	✓	-	-	-	-
Capacitance 280pF +/- 5%	-	-	-	-	-	-	-	-

HITAG is a registered trademark of NXP B.V.



Smart label IC family overview – 13.56 MHz (HF)

Product features	ICODE® SL-L	ICODE® SL-L	ICODE® SL-L	ICODE® SL-LX-S	ICODE® SL-LX-S	ICODE® SL-LX-S	ICODE® SL-LT	ICODE® ILT-M	ICODE® DNA
Standard	ISO 18000-3M1 ISO 15693	ISO 18000-3M1 ISO 15693	ISO 18000-3M1 ISO 15693	ISO 18000-3M1 ISO 15693	ISO 18000-3M1 ISO 15693	ISO 18000-3M1 ISO 15693	EPC Class-1 HF ¹ ISO 18000-3M3	EPC Class-1 HF ¹ ISO 18000-3M3	ISO 18000-3M1 ISO 15693-2, 3
User memory [bit]	256	256	896	1280	1280	2528	-	-	512
EPC code size [bit]	-	-	-	96	-	-	up to 240	up to 240	up to 240
UID (UID-1) size [bit]	64	64	64	64	64	64	96 (UID)	96 (UID)	96 (UID)
Data retention [Years]	10	50	10	50	50	50	50	50	50
Write endurance (cycles)	100,000	100,000	up to 60 units/s	up to 60 units/s	up to 60 units/s	up to 60 units/s	up to 700 units/s	up to 700 units/s	up to 90 units/s
Anticollision speed	up to 60 units/s	up to 60 units/s	up to 60 units/s	up to 60 units/s	up to 60 units/s	up to 60 units/s	up to 700 units/s	up to 700 units/s	up to 90 units/s
Fast inventory	✓	✓	✓	✓	✓	✓	-	-	✓
Security Functions									
EAS	✓	✓	✓	✓	✓	✓	✓	✓	✓
EAS password protection	32 bit password	32 bit password	32 bit password	32 bit password	32 bit password	32 bit password	32 bit password	32 bit password	AES-128 bit
EAS selective	✓	✓	✓	✓	✓	✓	-	-	-
AH	-	✓	✓	✓	✓	✓	-	-	✓
AH password protection	-	32 bit password	-	-	-	32 bit password	-	-	✓
Persistent quiet	-	-	-	-	-	✓	-	-	✓
Memory write lock	✓	✓	-	-	-	✓	-	-	✓
Memory access password protection	-	✓	-	-	-	32 bit password	-	-	-
Privacy password protection	32 bit password	32 bit password	-	32 bit password	32 bit password	32 bit password	32 bit password	32 bit password	AES-128 bit
Destruct password protection	32 bit password	32 bit password	-	32 bit password	32 bit password	32 bit password	-	-	AES-128 bit
Counter	-	-	-	-	-	✓	-	-	-
Originality signature	-	-	-	-	-	✓	-	-	re-programmable
Crc capacitance [pF]	23 / 97	23 / 97	no / 23 / 97	23 / 97	23 / 97	23	0 / 23 / 97	0 / 23 / 97	23.5
Delivery types									
Wafer FPC	SL2K55001EWV7	SL255002FD	SL2K53001DWV1D	SL255002FD	SL2K5301EWV7	SL255002FD	SL255002FD	SL25512HD	SL256002FD0B6
Wafer FCC - HC	SL2K53101EWV7	SL25102FD	-	SL25102FD	SL2K5401EWV7	SL255402FD	SL255402FD	SL251612HD	-
Wafer FCC - MC	-	-	-	-	-	-	-	-	-
SOT122	-	SL255002FB	-	SL255002FB	-	SL255002FB	SL255002FB	SL251512FB	-
SOT122 - HC	-	-	-	SL25102FB	-	-	-	SL251612FB	-
SOT122 - MC	-	-	-	-	-	-	-	SL251412FB	-
MD48	-	-	-	SL252002F48	-	-	-	-	-

¹ EPCglobal/Auto-ID Center Specification: 13.56 MHz SSM Band Class 1 Radio Frequency Identification Tag Interface ³ With extended fast inventory read

ICODE is a registered trademark of NXP B.V.



UHF tag IC family overview – 840-960 MHz (UHF)

Product features	UCODE® G2XL	UCODE® G2XM	UCODE® G2L	UCODE® G2L+	UCODE® G2M	UCODE® G2M+	UCODE® 7	UCODE® 7m	UCODE® 7mm+	UCODE® 1C	UCODE® DNA ²
RF interface	840 - 960 MHz										
EPC global standard	1.0.9 / 1.1.0	1.0.9 / 1.1.1	1.2.0	1.2.0	1.2.0	1.2.0	1.2.0	1.2.0	1.2.0	1.2.0	GSI Gen2 v2.0 ISO2016 r10 ISO18000-63
User memory [bit]	-	512	-	-	512	up to 640 tags on EPC size	-	32	2048	3328	3072
EPC code size [bit]	240	240	128	128	256	256-448	128	128	448	160	224
TD size [bit]	64	64	64	64	96	96	96	96	96	96	96
Access password [bit]	32	32	32	32	32	32	32	32	32	32	32
UID password [bit]	32	32	32	32	32	32	32	32	32	32	32
User password	-	-	-	-	-	32	-	-	-	-	-
Data retention [Years]	50	50	20	20	20	20	20	20	20	20	20
Write endurance [cycles]	100,000	100,000	10,000	10,000	10,000	100,000	100,000	100,000	100,000	50,000	100,000
Feature set											
Read protection (bankwise)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Block perm. lock	-	✓	-	-	✓	-	-	-	✓	-	-
Tag authentication	-	-	-	-	-	-	-	-	-	-	AES - 128 Bit
Privacy protection	-	-	-	-	-	-	-	-	-	-	✓
Block write	-	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Segmented user memory	-	-	-	-	-	-	-	-	-	-	✓
PSF (Product Status Flag - EAS)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Automatic self pre-serialization	-	-	-	-	-	-	-	-	-	-	✓
Parallel encoding	-	-	-	-	-	-	-	✓	✓	-	✓
Tag power indicator	-	-	-	-	-	-	✓	✓	✓	-	✓
Tag tamper alarm	-	-	-	-	-	✓	-	-	-	-	-
Digital switch	-	-	-	✓	-	-	-	-	-	✓	-
External supply mode	-	-	-	✓	-	✓	-	-	-	-	-
Backscatter strength reduction	-	✓	✓	✓	-	-	-	✓	✓	✓	✓
Real read range reduction (4R)	-	✓	✓	✓	-	✓	-	-	-	✓	✓
Digital signature [bit]	-	-	-	-	-	-	-	-	✓	-	✓
Unreadable	-	-	-	-	-	-	-	-	✓	-	✓
Data transfer	-	-	-	✓	-	✓	-	-	-	✓	-
Bridge mode for fast data transfer	-	-	-	-	-	-	-	-	-	✓	-
2 UHF Front Ends	-	-	-	-	-	-	-	-	-	✓	-
PC interface	-	-	-	-	-	-	-	-	-	✓	-
Trust provisioning service	-	-	-	-	-	-	-	-	-	-	✓
Packages											
Wafer FCC 150µm	SL3K532021G6	SL3K53002FB6	SL351209FD	SL351213FD	SL351003FD	SL351013FD	SL3512H4FD/84G	SL351004FD	SL351004FD	-	SL3530020NFUD
Wafer FCC 120µm	SL351202FB1	SL351002FB1	-	-	-	-	-	-	-	-	-
S011122	-	-	SL351209FD	SL351209FD	SL351209FD	SL351209FD	SL351204H1FB0	SL351204H1FB0	SL351204H1FB0	-	-
S01886	-	-	SL351209FD	SL351209FD	SL351209FD	SL351209FD	SL351204H1FB0	SL351204H1FB0	SL351204H1FB0	-	-
S01 902-3 (N0818)	-	-	-	-	-	-	-	-	-	-	SL35401THK