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CONTENTS

FOREWORD 12
1 Scope 14
2 Normative references 14
3 Terms, definitions, abbreviations, and conventions 14
3.1 Terms and definitions 14
3.2 Abbreviations 17
3.3 Conventions 19
4 Data coding 20
4.1 Overview 20
4.2 Basic data type coding 21
4.2.1 Integer coding 21
4.2.2 Unsigned coding 21
4.2.3 Float coding 22
4.2.4 Octetstring coding 23
4.2.5 Bit Field coding 23
4.2.6 TimeData coding 23
4.2.7 KeyData coding 23
4.3 Structured data type coding 24
4.3.1 Structure type coding 24
4.3.2 List type coding 24
5 WIA-FA overview 24
5.1 Device types 24
5.1.1 Host computer 24
5.1.2 Gateway device 24
5.1.3 Access device 24
5.1.4 Field device 25
5.1.5 Handheld device 25
5.2 Network topology 25
5.3 Protocol architecture 26
6 System management 28
6.1 Overview 28
6.2 Device Management Application Process 28
6.2.1 Network manager 31
6.2.2 Security manager 31
6.2.3 Network management module 31
6.2.4 Security management module 31
6.2.5 DMAP state machines 31
6.3 Addressing and address assignment 42
6.4 Communication resource allocation 42
6.4.1 General 42
6.4.2 Communication resource allocation 43
6.5 Joining and leave process of field device 44
6.5.1 Joining process of a field device 44
6.5.2 Communication resource allocation to field device 45
6.5.3 Leaving process of a field device 45
6.6 Network performance monitoring 46

6.6.1 Device status report 46
6.6.2 Channel condition report 47
6.7 Management information base and services 47
6.7.1 Management information base 47
6.7.2 MIB services 57
7 Physical layer 61
7.1 General 61
7.2 General requirements based on IEEE STD 802.11-2012 61
7.3 Additional requirements 62
7.3.1 General 62
7.3.2 Frequency band 62
7.3.3 Channel bitmap 62
7.3.4 Transmission power 63
7.3.5 Data rate 63
8 Data Link Layer 64
8.1 General 64
8.1.1 Protocol architecture 64
8.1.2 WIA-FA superframe 64
8.1.3 Communication based on multiple access devices 67
8.1.4 Time synchronization 68
8.1.5 Aggregation/Disaggregation 69
8.1.6 Retransmission 70
8.2 Data link sub-layer data services 73
8.2.1 General 73
8.2.2 DLDE-DATA.request primitive 73
8.2.3 DLDE-DATA.indication primitive 74
8.2.4 Time sequence of DLL data service 75
8.3 Data link sub-layer management services 76
8.3.1 General 76
8.3.2 Network discovery services 76
8.3.3 Time synchronization services 78
8.3.4 Device joining services 80
8.3.5 Device status report services 83
8.3.6 Channel condition report services 85
8.3.7 Remote attribute get services 86
8.3.8 Remote attribute configuration services 90
8.3.9 Device leaving services 93
8.4 DLL frame formats 94
8.4.1 General frame format 94
8.4.2 Date frame format 96
8.4.3 Aggregation frame format 96
8.4.4 NACK frame format 97
8.4.5 GACK frame format 97
8.4.6 Beacon frame format 97
8.4.7 Join request frame format 98
8.4.8 Join response frame format 98
8.4.9 Leave request frame format 98
8.4.10 Device status report frame format 99
8.4.11 Channel condition report frame format 99

8.4.12 Time synchronization request frame format 99
8.4.13 Time synchronization response frame format 99
8.4.14 Remote attribute get request frame format 100
8.4.15 Remote attribute get response frame format 100
8.4.16 Remote attribute set request frame format 101
8.4.17 Remote attribute set response frame format 101
8.5 Data link layer state machines 101
8.5.1 DLL state machine of access field 101
8.5.2 DLL state machine of field device 105
8.5.3 Functions used in DLL state transitions 110
9 Wired specifications between GW and AD 111
9.1 Overview 111
9.2 Join process of access device 111
9.3 Frame formats between GW and AD 111
10 Application Layer 113
10.1 Overview 113
10.2 AL protocol stack 114
10.3 AL functions 114
10.3.1 Data function 114
10.3.2 Management function 114
10.3.3 Communication mode 115
10.4 Application data 115
10.4.1 General 115
10.4.2 Process data 116
10.4.3 Event data 117
10.5 User application process 118
10.5.1 General 118
10.5.2 User application object 119
10.5.3 IO data images on gateway device 119
10.5.4 Alarm mechanism 120
10.5.5 Application configuration process 120
10.6 Application services 126
10.6.1 Confirmed services and unconfirmed services 126
10.6.2 READ service 127
10.6.3 WRITE service 128
10.6.4 PUBLISH Service 129
10.6.5 REPORT Service 130
10.6.6 REPORT ACK 131
10.7 Application sublayer 132
10.7.1 Overview 132
10.7.2 ASL data service 132
10.7.3 ASL packet format 135
11 Security 155
11.1 General 155
11.1.1 Security management architecture 155
11.1.2 Security functions 156
11.1.3 Keys 156
11.2 Security services 157
11.2.1 General 157

11.2.2 Key establish service 158
11.2.3 Key update service 160
11.2.4 Security alarm service 162
11.3 Secure join 164
11.3.1 General 164
11.3.2 Secure join process of FD 164
11.4 Key management 165
11.4.1 General 165
11.4.2 Key establish process 165
11.4.3 Key update process 166
11.5 DLL secure communication 168
11.6 Security alarm 169
11.7 Secure frame format 169
11.7.1 General secure DLL frame format 169
11.7.2 Secure aggregation frame format 171
11.7.3 Key establish request frame format 172
11.7.4 Key establish response frame format 172
11.7.5 Key update request frame format 172
11.7.6 Key update response frame format 173
11.7.7 Security alarm request frame format 173
Annex A (informative) Security strategy for WIA-FA network 174
A.1 Risk analysis for WIA-FA network 174
A.2 Security principles for WIA-FA network 174
A.3 Security objectives for WIA-FA network 174
A.4 Security grade of WIA-FA network 175
Annex B (informative) Regional modification for compliance with ETSI standards 176
B.1 General 176
B.2 Compliance with ETSI EN 300 440-2 V1.4.1 176
B.3 Compliance with ETSI EN 300 328 V1.8.1 176
Bibliography 180

Figure 1 – Conventions used for state machines 19
Figure 2 – Integer coding 21
Figure 3 – Unsigned coding 21
Figure 4 – Single float coding 22
Figure 5 – Double float coding 22
Figure 6 – WIA-FA enhanced star topology 25
Figure 7 – OSI basic reference model mapped to WIA-FA 26
Figure 8 – Protocol architecture of WIA-FA 27
Figure 9 – Data flow over WIA-FA network 27
Figure 10 – System management scheme 28
Figure 11 – DMAP of management system 29
Figure 12 – DMAP state machine of gateway device 32
Figure 13 – DMAP state machine of gateway device for each field device 33
Figure 14 – DMAP state machine of a field device 37
Figure 15 – Long address structure of device 42

Figure 16 – Joining process of field device 44
Figure 17 – Communication resource allocation process for a field device 45
Figure 18 – Passive leave process of a field device 46
Figure 19 – Device status report process of field device 46
Figure 20 – Channel condition report process of field device 47
Figure 21 – BitMap format 62
Figure 22 – WIA-FA DLL protocol architecture 64
Figure 23 – The template of timeslot structure 65
Figure 24 – WIA-FA default superframe 66
Figure 25 – WIA-FA superframe 66
Figure 26 – The example of WIA-FA devices multi-channel communication 66
Figure 27 – An example of beacon communication based on multiple ADs 67
Figure 28 – Process of one-way time synchronization 68
Figure 29 – Process of two-way time synchronization 69
Figure 30 – Aggregation frame payload format 70
Figure 31 – Example of retransmission mode based on NACK 71
Figure 32 – Example of multi-unicast retransmission mode 72
Figure 33 – Example of multi-broadcast retransmission mode 72
Figure 34 – Example of GACK-based timeslot backoff mode 73
Figure 35 – Time sequence of period data service from FD to GW 75
Figure 36 – Time sequence of other data service from FD to GW 75
Figure 37 – Time sequence of data service from GW to FD 76
Figure 38 – Network discovery process 78
Figure 39 – Time synchronization process 80
Figure 40 – Device join process 83
Figure 41 – Device status report process 84
Figure 42 – Channel condition report process 86
Figure 43 – Remote attribute get process 89
Figure 44 – Remote attribute set process 93
Figure 45 – Device leave process 94
Figure 46 – General frame format 95
Figure 47 – DLL frame header 95
Figure 48 – DLL frame control format 95
Figure 49 – DLL Date frame format 96
Figure 50 – DLL Aggregation frame format 97
Figure 51 – NACK frame format 97
Figure 52 – GACK frame format 97
Figure 53 – GACK information 97
Figure 54 – DLL Beacon frame format 97
Figure 55 – Shared timeslot count 98
Figure 56 – DLL join request frame format 98
Figure 57 – DLL join request frame format 98
Figure 58 – DLL leave request frame format 99

Figure 59 – DLL Device status report frame format 99
Figure 60 – DLL Channel condition report frame format 99
Figure 61 – DLL time synchronization request frame format 99
Figure 62 – DLL time synchronization response frame format 99
Figure 63 – DLL Remote attribute get request frame format 100
Figure 64 – DLL remote attribute get response frame format 100
Figure 65 – DLL Remote attribute set request frame format 101
Figure 66 – DLL remote attribute set response frame format 101
Figure 67 – DLL state machine of access device 102
Figure 68 – DLL state machine of field device 106
Figure 69 – General frame format between GW and AD 111
Figure 70 – AL portions within WIA-FA protocol stack 114
Figure 71 – The relationships between UAPs and DAPs 118
Figure 72 – User application objects 119
Figure 73 – Implementation example of IO data images on the gateway device 120
Figure 74 – C/S VCR relationships between GW and FDs 122
Figure 75 – P/S VCR relationships between GW and FDs 123
Figure 76 – P/S VCR relationships between FDs and GW 123
Figure 77 – R/S VCR relationships between FDs and GW 124
Figure 78 – Configuration process for a field device 125
Figure 79 – UAO aggregation and disaggregation process 126
Figure 80 – READ request message format 127
Figure 81 – READ response(+) message format 127
Figure 82 – READ response(-) message format 127
Figure 83 – READ Service process 128
Figure 84 – WRITE request message format 128
Figure 85 – WRITE response(-) message format 128
Figure 86 – WRITE Service process 129
Figure 87 – PUBLISH request message format 129
Figure 88 – PUBLISH Procedure from Field Device to Gateway Device 130
Figure 89 – PUBLISH Procedure from Gateway Device to Field Device 130
Figure 90 – REPORT request message format 130
Figure 91 – REPORT Service process 131
Figure 92 – REPORT ACK request message format 131
Figure 93 – REPORT ACK response(+) message format 131
Figure 94 – REPORT ACK response(-) message format 131
Figure 95 – REPORT ACK Service process 132
Figure 96 – ASL general packet format 135
Figure 97 – Format of packet control field 135
Figure 98 –Confirmed service primitives exchanged between layers 137
Figure 99 – Unconfirmed service primitives exchanged between layers 138
Figure 100 – Primitives invoking for read/ write MIB between layers 139
Figure 101 – State transition diagram of AMCL 140

Figure 102 – State transition diagram of AMSV 142
Figure 103 – State transition diagram of AMPB 146
Figure 104 – State transition diagram of AMSB 149
Figure 105 – State transition diagram of AMRS 152
Figure 106 – State transition diagram of AMRK 152
Figure 107 – Security management architecture 155
Figure 108 – Life cycle of keys 157
Figure 109 – Format of NONCE 158
Figure 110 – Time sequence of key establishment 160
Figure 111 – Time sequence of key updating 162
Figure 112 – SecAlarmt_Struct structure 163
Figure 113 – Time sequence of security alarm 163
Figure 114 – Secure join process of field device 165
Figure 115 – Key establish process for field device 166
Figure 116 – Key update state machine for FD 167
Figure 117 – General secure DLL frame format 170
Figure 118 – Secure aggregation frame format 171
Figure 119 – Key establish request frame format 172
Figure 120 – Key establish response frame format 172
Figure 121 – Key update request frame format 172
Figure 122 – Key update response frame format 173
Figure 123 – Security alarm request frame format 173
Figure B.1 – Timeslot timing template 177

Table 1 – Conventions used for state transitions 20
Table 2 – Definition of integer data type 21
Table 3 – Unsigned16 coding 21
Table 4 – Octetstring coding 23
Table 5 – Coding of Bit Field data with one octet 23
Table 6 – Coding of Bit Field data with two octets 23
Table 7 – Coding of Bit Field data with three octet 23
Table 8 – Network management functions 30
Table 9 – Security management functions 30
Table 10 – DMAP state transition of gateway device 32
Table 11 – DMAP state transition of gateway device for each field device 34
Table 12 – DMAP state transition of a field device 38
Table 13 – Functions used in DMAP state transition 41
Table 14 – Unstructured attributes 48
Table 15 – Structured attributes 50
Table 16 – Superframe_Struct structure 50
Table 17 – Link_Struct structure 51
Table 18 – ChanCon_Struct structure 51
Table 19 – Device_Struct 52

Table 20 – Key_Struct structure 53
Table 21 – VcrEP_Struct definition 54
Table 22 – UAOClassDesc_Struct definition 55
Table 23 – ProDataDesc_Struct definition 56
Table 24 – UAOInstDesc_Struct definition 57
Table 25 – DMAP-MIB-GET.request parameters 58
Table 26 – DMAP-MIB-GET.confirm parameters 59
Table 27 – DMAP-MIB-SET.request parameters 60
Table 28 – DMAP-MIB-SET.confirm parameters 60
Table 29 – PHY protocol selection 61
Table 30 – Coding of Modulation modes 62
Table 31 – Channel indices 63
Table 32 – Data rate 63
Table 33 – Parameters of timeslot template 65
Table 34 – DLDE-DATA.request primitive parameters 74
Table 35 – DLDE-DATA.indication primitive parameters 74
Table 36 – Management services 76
Table 37 – DLME-DISCOVERY.request parameters 77
Table 38 – DLME-DISCOVERY.confirm parameters 77
Table 39 – BeaconDescription_Struct parameters 77
Table 40 – DLME-TIME-SYN.indication parameters 78
Table 41 – DLME-TIME-SYN.response parameters 79
Table 42 – DLME-TIME-SYN.confirm parameters 79
Table 43 – DLME-JOIN.request parameters 81
Table 44 – DLME-JOIN.indication parameters 81
Table 45 – DLME-JOIN.response parameters 82
Table 46 – DLME-JOIN.confirm parameters 82
Table 47 – DLME-DEVICE-STATUS.request parameters 83
Table 48 – DLME-DEVICE -STATUS.indication parameters 84
Table 49 – DLME-DEVICE -STATUS.confirm parameters 84
Table 50 – DLME-CHANNEL-CONDITION.request parameters 85
Table 51 – DLME-CHANNEL-CONDITION.indication parameters 85
Table 52 – DLME-CHANNEL-CONDITION.confirm parameters 86
Table 53 – DLME-INFO-GET.request parameters 87
Table 54 – DLME-INFO-GET.indication parameters 87
Table 55 – DLME-INFO-GET.response parameters 88
Table 56 – DLME-INFO-GET.confirm parameters 89
Table 57 – DLME-INFO-SET.request parameters 90
Table 58 – DLME-INFO-SET.Indication parameters 91
Table 59 – DLME-INFO-SET response parameters 92
Table 60 – DLME-INFO-SET.confirm parameters 92
Table 61 – DLME-LEAVE.request parameters 93
Table 62 – DLME-LEAVE.confirm parameters 94

Table 63 – Frame type coding 96
Table 64 – Addressing mode subfields 96
Table 65 – DLL state transition of access device 103
Table 66 – DLL state transition of field device 107
Table 67 – Functions used in DMAP state transition 110
Table 68 – Wired services between GW and AD 112
Table 69 – Service parameters of AD join request 113
Table 70 – Service parameters of AD join response 113
Table 71 – Service parameters of GW requesting AD to send GACK 113
Table 72 – Parameters of GACKInfo_Struct structure 113
Table 73 – Service parameters of GW requesting AD to send NACK 113
Table 74 – Communication models between gateway device and field devices 115
Table 75 – SingleAnalogData definition 116
Table 76 – DoubleAnalogData definition 116
Table 77 – DigitalData8 definition 116
Table 78 – DigitalData16 definition 117
Table 79 – DigitalData32 definition 117
Table 80 – EventData Definition 117
Table 81 – UAO events definitions 118
Table 82 – VCR attribute configuration overview 121
Table 83 – Application services supported by UAPs 126
Table 84 – Error code definition for READ response(-) message 127
Table 85 – Error code definition for WRITE response(-) 129
Table 86 – Error code definition for REPORT ACK negative response 132
Table 87 – ASLDE-DATA.request primitive parameter definitions 133
Table 88 – ASLDE-DATA.indication primitive parameter definitions 133
Table 89 – ASLDE-DATA.response primitive parameter definition 134
Table 90 – ASLDE-DATA.confirmPrimitive Parameters 135
Table 91 – Service Identifier subfield definition 135
Table 92 – Message Type subfield definition 136
Table 93 –Confirmed service primitives exchanged between ASL and other layers 137
Table 94 – Unconfirmed service primitives exchanged between ASL and other layers 138
Table 95 – Primitives for read/ write MIB between layers 139
Table 96 – State transition table of AMCL 140
Table 97 – State transition table of AMSV 142
Table 98 – State transition table of AMPB 146
Table 99 – State transition table of AMSB 149
Table 100 – State transition table of AMRS 152
Table 101 – State transition table of AMRK 153
Table 102 – All Functions in ASLM 154
Table 103 – Parameters for KEY-ESTABLISH.request 158
Table 104 – KeyMaterial_Struct structure 158
Table 105 – Parameters for KEY-ESTABLISH.indication 159

Table 106 – Parameters for KEY-ESTABLISH.response 159
Table 107 – Parameters for KEY-ESTABLISH.confirm 160
Table 108 – Parameters for KEY-UPDATE.request 160
Table 109 – Parameters for KEY-UPDATE.indication 161
Table 110 – Parameters for KEY-UPDATE.response 161
Table 111 – Parameters for KEY-UPDATE.confirm 162
Table 112 – Parameters for SEC-ALARM.request 162
Table 113 – Parameters for SEC-ALARM.indication 163
Table 114 – Key update states 166
Table 115 – Key update state transition 168
Table 116 – Keys used in DLL secure communication 169
Table 117 – Available security levels for DLL 171
Table A.1 – Security grades for WIA-FA network 175
Table B.1 – Applicable EN 300 440-2 requirements list 176
Table B.2 – Applicable EN 300 328 requirements list 177
Table B.3 – Timeslot timing definitions and calculations 178
Table B.4 – TxMaxPHYPacket of FHSS 178
Table B.5 – TxMaxPHYPacket of DSSS/HR-DSSS 179
Table B.6 – TxMaxMPDU of OFDM 179

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INDUSTRIAL NETWORKS – WIRELESS COMMUNICATION NETWORK AND COMMUNICATION PROFILES – WIA-FA

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INDUSTRIAL NETWORKS – WIRELESS COMMUNICATION NETWORK AND COMMUNICATION PROFILES – WIA-FA

1 Scope

This PAS specifies the system architecture and communication protocol of WIA-FA (Wireless Networks for Industrial Automation – Factory Automation) based on IEEE STD 802.11-2012 Physical Layer (PHY).

This PAS applies to wireless network systems for factory automation measuring, monitoring and control.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

IEC 61588, *Precision clock synchronization protocol for networked measurement and control systems*

IEC 61499, *The industrial process measurement and control system function blocks*

ISO/IEC 7498-1, *Information Technology – Open Systems Interconnection – Basic Reference Model – The Basic model*

IEEE STD 802.11-2012, *IEEE Standard for Information technology – Telecommunications and information exchange between systems – Local and metropolitan area networks – Specific requirements – Part 11: Wireless LAN Medium Access Control (MAC) and Physical Layer (PHY) specifications*