

**Appendix XII – Mapping Table for Information Container ID Fields –
ArchSD**

TABLE OF CONTENTS

1.	ArchSD - Architectural Design	XII-1
1.1.	Fields Mapping Table.....	XII-1
1.2.	Fields Mapping Diagram.....	XII-3
1.3.	Fields that match with this Guide.....	XII-4
1.4.	Fields that Needs to be Mapped	XII-4
2.	ArchSD – Building Services Installation.....	XII-5
2.1.	Fields Mapping Table.....	XII-5
2.2.	Fields Mapping Diagram.....	XII-7
2.3.	ArchSD’s Fields that Match with this Guide.....	XII-8
2.4.	ArchSD’s Fields that Needs to be Mapped	XII-8
3.	ArchSD – Structural Engineering.....	XII-10
3.1.	Fields Mapping Table.....	XII-10
3.2.	Fields Mapping Diagram.....	XII-12
3.3.	Fields that Match with this Guide	XII-13
3.4.	Fields that Needs to be Mapped	XII-13

List of Tables

Table App XII-1 Field Mapping for ArchSD AR Guide.....	XII-1
Table App XII-2 Code Mapping for ArchSD AR Guide.....	XII-4
Table App XII-3 Field Mapping for ArchSD BS Guide.....	XII-5
Table App XII-4 Codes Mapping for ArchSD BS Guide.....	XII-8
Table App XII-5 Field Mapping for ArchSD SE Guide.....	XII-10
Table App XII-6 Codes Mapping for ArchSD SE Guide	XII-13

List of Figures

Figure App XII-1 Field Mapping Diagram for ArchSD AR Guide.....	XII-3
Figure App XII-2 Field Mapping Diagram for ArchSD BS Guide	XII-7
Figure App XII-3 Field Mapping Diagram for ArchSD SE Guide.....	XII-12

1. ArchSD - Architectural Design

1.1. Fields Mapping Table

The naming convention of ArchSD BIM Guide for Architectural Design (thereafter referred to as ArchSD AR Guide) is extracted below:

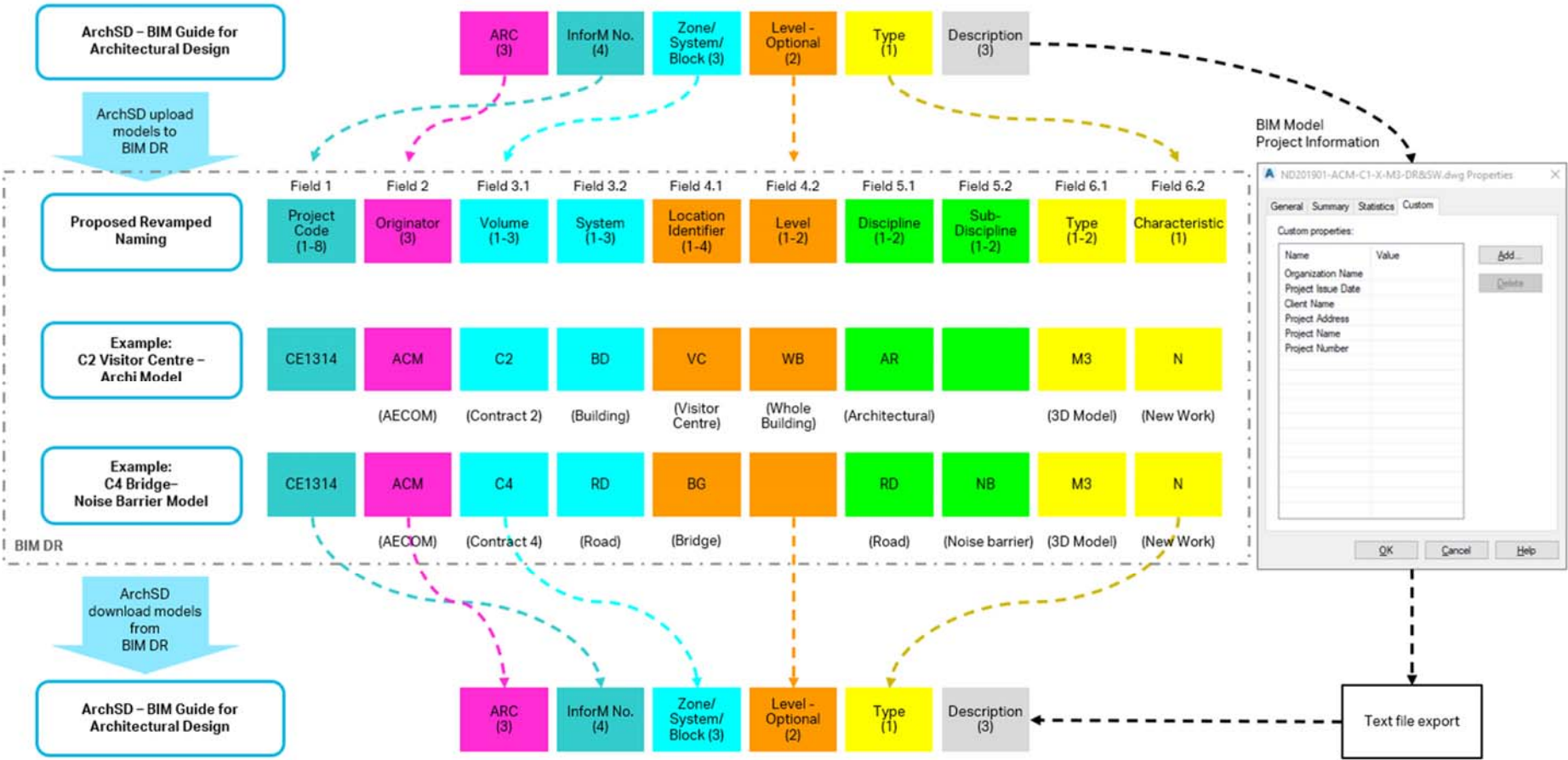
Table App XII-1 Field Mapping for ArchSD AR Guide

This Guide			ArchSD		
Field/ Sub-field No.	Information Container ID Field	Remark	Naming Field	ID Field Description	Code Mapping
1	Project Code		InforM No.	The unique number identifying the project	Not required
2	Originator		Agent Responsible Code	Agent Responsible Codes referenced in CAD Standard for Works Projects (CSWP), e.g.: ADA for Architectural Branch ADS for Structural Engineering Branch ADB for Building Services Branch	Not required
3.1	Volume		Zone/System/ Block	Identifier of which building, area, phase or zone of the project, the model file relates to if the project is sub-divided by zones). If the project has zoning, “Z01” should be added in this field. If the project has no zoning, “ALL” should be added in this field.	Not required
4.2	Sub-location		Level	Identifier of which level, or group of levels, the model file relates to if the project is sub-divided by levels.	Required
6.2	Characteristic		Type	Descriptive field defines the type of the project	Not required

This Guide			ArchSD		
Field/ Sub-field No.	Information Container ID Field	Remark	Naming Field	ID Field Description	Code Mapping
N/A	N/A	BIM Model Project Information	Description	Descriptive field defines the use of drawing, e.g. 01 for First Submission, 02 for Second Submission, etc.	N/A

1.2. Fields Mapping Diagram

Figure App XII-1 Field Mapping Diagram for ArchSD AR Guide



1.3. Fields that match with this Guide

Some naming fields of ArchSD AR Guide do not require mapping when sharing to (or downloading from) the BIM DR.:

- a) Field 1 Agent Responsible Code and Field 5 Type are the same as the Originator and Characteristic fields of this Guide.
- b) Fields 2 InforM No. and Field 3 Zone/System/Block are equivalent to the Project Code and Volume fields of this Guide. As these fields are project specific with no standard codification system, mapping is not required.
- c) Field 6 Description could be included in the BIM Model Project Information as BIM attributes. BIM Model Project Information should be inputted in all BIM files as part of the LOD-I for metadata extraction and geolocation. Appendix VI of this Guide shown some examples of project information input methods. This field could be automatically read by the BIM DR and exported upon request.

1.4. Fields that Needs to be Mapped

For the remaining fields, the following code mapping should apply:

Table App XII-2 Code Mapping for ArchSD AR Guide

ArchSD AR Guide		BIM Harmonisation Guidelines	
Field 4: Level (2 characters)		Field 4.2 Sub-location (2 characters)	
Codes	Definition	Codes	Definition
B2	Basement Level 2	B2	Basement Level 2
B1	Basement Level 1	B1	Basement Level 1
LG	Lower Ground Floor	LG	Lower Ground Floor
UG	Upper Ground Floor	UG	Upper Ground Floor
GF	Ground Floor	GF	Ground Floor
1F	1st Floor	01	Level 01
MF	Mezzanine Floor	MF	Mezzanine Floor
RF	Roof	RF	Roof
UR	Upper Roof	UR	Upper Roof
AL	All Levels (a single model contain all levels)	AL	All levels (of a specific building zone)
N/A	N/A	ES	Reference level from engineering survey
N/A	N/A	M1	Mezzanine above level 01
N/A	N/A	M2	Mezzanine Above Level 02
N/A	N/A	PL	Podium Level
N/A	N/A	WB	Whole Building

2. ArchSD – Building Services Installation

2.1. Fields Mapping Table

The naming convention of ArchSD BIM Guide for Building Services Installation (thereafter referred to as ArchSD BS Guide) is extracted below:

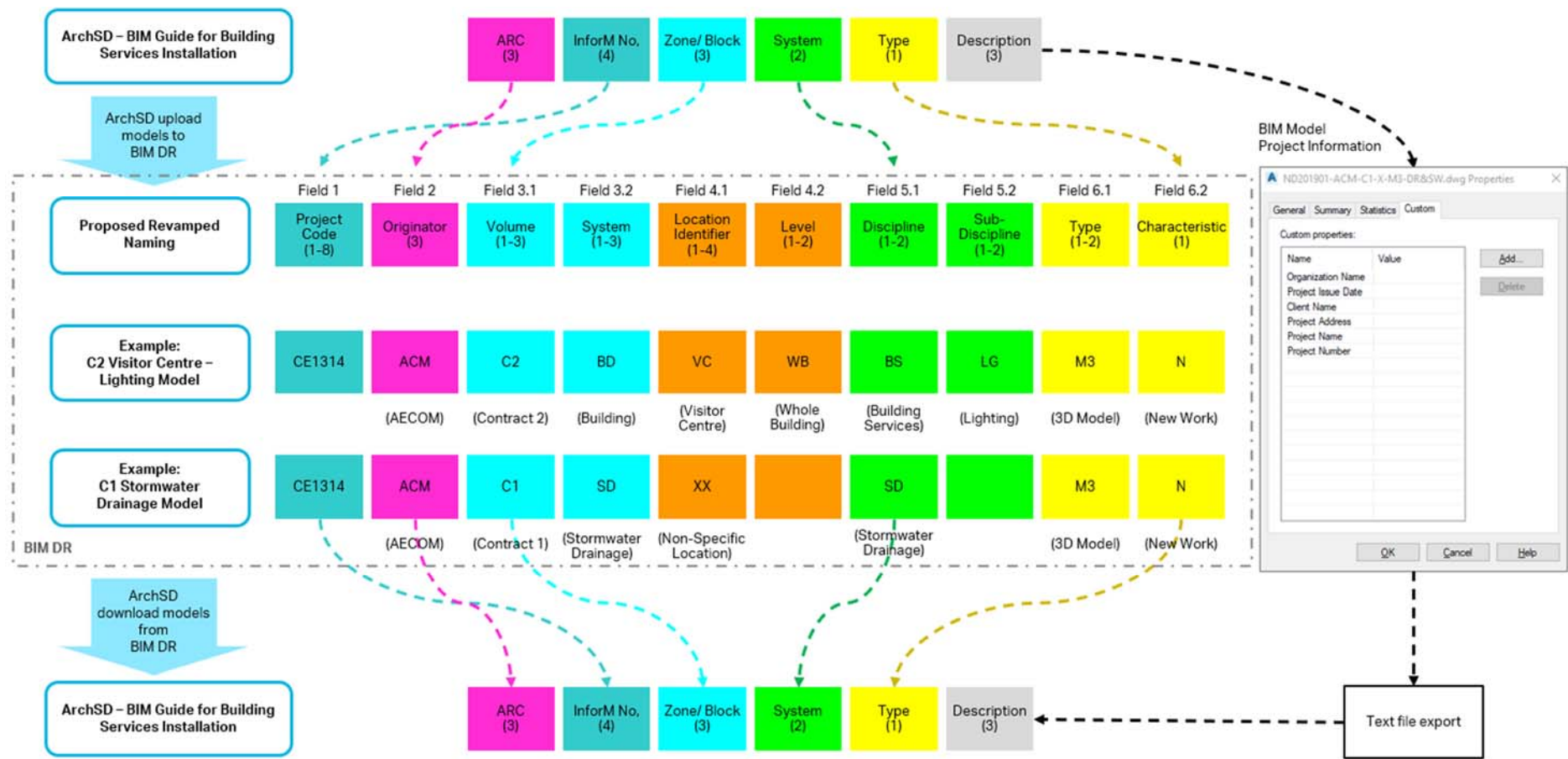
Table App XII-3 Field Mapping for ArchSD BS Guide

This Guide			ArchSD		
Field/ Sub- field No.	Information Container ID Field	Remark	Naming Field	Field Description	Code Mapping
1	Project Code		InForM Number	InForM number of the project	Not required
2	Originator		Agent Responsible Code	3 characters (alphanumeric) for Agent Responsible Code, e.g.: ADA for architectural discipline of ArchSD ADB for building services discipline of ArchSD ADS for structural discipline of ArchSD	Not required
3.1	Volume		Zone / Block	Identifier of building zone, block or phase of the project, e.g.: Zone 1 : “Z01” No zoning : “All” should be used in this field	Not required
5.1	Discipline		System	2 characters (alphabetic) for short form of system	Required
6.2	Characteristic		Type	1 character (alphabetic) define the status of the project	Not required

This Guide			ArchSD																						
Field/ Sub-field No.	Information Container ID Field	Remark	Naming Field	Field Description			Code Mapping																		
N/A	N/A	BIM Model Project Information	Description	3 characters (alphabetic) describe the use of model, e.g.: <table><tr><td><u>Code</u></td><td><u>Use</u></td><td><u>Workstage involved</u></td></tr><tr><td>P01</td><td>Presentation</td><td>1-6</td></tr><tr><td>D01</td><td>SCCU Drainage Submission</td><td>3-6</td></tr><tr><td>T01</td><td>Tender</td><td>4</td></tr><tr><td>WIP</td><td>Work in Progress</td><td>1-6</td></tr><tr><td>X01</td><td>Design Option</td><td>1-4</td></tr></table>			<u>Code</u>	<u>Use</u>	<u>Workstage involved</u>	P01	Presentation	1-6	D01	SCCU Drainage Submission	3-6	T01	Tender	4	WIP	Work in Progress	1-6	X01	Design Option	1-4	N/A
<u>Code</u>	<u>Use</u>	<u>Workstage involved</u>																							
P01	Presentation	1-6																							
D01	SCCU Drainage Submission	3-6																							
T01	Tender	4																							
WIP	Work in Progress	1-6																							
X01	Design Option	1-4																							

2.2. Fields Mapping Diagram

Figure App XII-2 Field Mapping Diagram for ArchSD BS Guide



2.3. ArchSD's Fields that Match with this Guide

Some naming fields of ArchSD BS Guide do not require mapping when sharing to (or downloading from) the BIM DR.

- a) Field 1 Agent Responsible Code and Field 5 Type are the same as the Originator and Characteristic fields of this Guide.
- b) Fields 2 InForM No. and Field 3 Zone/System/Block are equivalent to the Project Code and Volume fields of this Guide. As these fields are project specific with no standard codification system, mapping is not required.
- c) Field 6 Description could be included in the BIM Model Project Information as BIM attributes. BIM Model Project Information should be inputted in all BIM files as part of the LOD-I for metadata extraction and geolocation. Appendix VI of this Guide shown some examples of project information input methods. This field could be automatically read by the BIM DR and exported upon request.

2.4. ArchSD's Fields that Needs to be Mapped

For the remaining fields, the following code mapping should apply:

Table App XII-4 Codes Mapping for ArchSD BS Guide

ArchSD BS Guide		BIM Harmonisation Guidelines	
Field 4: System (2 characters)		Field 5.1 Discipline (2 characters)	
Codes	Definition	Codes	Definition
BS	Building Services	BS	Building Services
EE	Electrical	EL	Electrical
FS	Fire Service	FS	Fire Services
AC	Air-conditioning	Suggest to rearrange as a sub-discipline under Building Services (refer to EMSD)	
N/A	N/A	AR	Architectural
N/A	N/A	CD	Chilled Water Distribution
N/A	N/A	FO	Sewerage
N/A	N/A	FW	Fresh Water System
N/A	N/A	GS	Gas Supply
N/A	N/A	IR	Irrigation
N/A	N/A	LA	Landscape
N/A	N/A	ME	Mechanical
N/A	N/A	PS	Electrical Power Supply
N/A	N/A	RD	Road
N/A	N/A	RW	Raw Water System
N/A	N/A	SD	Stormwater Drainage
N/A	N/A	SF	Site Formation

ArchSD BS Guide		BIM Harmonisation Guidelines	
Field 4: System (2 characters)		Field 5.1 Discipline (2 characters)	
Codes	Definition	Codes	Definition
N/A	N/A	SL	Slope
N/A	N/A	ST	Structural
N/A	N/A	SW	Salt Water System
N/A	N/A	TC	Telecommunication
N/A	N/A	WR	Recycled Water System
N/A	N/A	XX	General (non-disciplinary)
N/A	N/A	ZZ	Multiple disciplines for combined model

3. ArchSD – Structural Engineering

3.1. Fields Mapping Table

The naming convention of ArchSD BIM Guide for Structural Engineering (thereafter referred to as ArchSD SE Guide) is extracted below:

Table App XII-5 Field Mapping for ArchSD SE Guide

This Guide			ArchSD		
Field/ Sub-field No.	Information Container ID Field	Remark	Naming Field	Field Description	Code Mapping
1	Project Code		InforM No.	InForM No. (Project Number)	Not required
2	Originator		Agent Responsible Code	Agent Responsible Code “ADS” stand for Architectural Services Department, Structural Engineer Branch	Not required
3.1	Volume		Zone/ Block	Required if project is subdivided by zone or block (default=ALL)	Not required
4.2	Sub-location		Type	Type N: New work, T: Temporary work, E: EXIsting, D: Demolition, W: All work	Not required
6.1	Type		File Usage	File Usage: MO for Structural Model SH for Drawing Sheet Set CO for Combined with Structural and Drawing Sheet Set	Required

This Guide			ArchSD		
Field/ Sub-field No.	Information Container ID Field	Remark	Naming Field	Field Description	Code Mapping
				GI for Site Formation and Ground Investigation Model	
N/A	N/A		Software Version	Software Version 16 for version 2016	N/A

3.2. Fields Mapping Diagram

Figure App XII-3 Field Mapping Diagram for ArchSD SE Guide



3.3. Fields that Match with this Guide

Some naming fields of ArchSD SE Guide do not require mapping when sharing to (or downloading from) the BIM DR.

- a) Field 1 Agent Responsible Code and Field 4 Type are the same as the Originator and Characteristic fields of this Guide.
- b) Fields 2 InforM No. and Field 3 Zone/System/Block are equivalent to the Project Code and Volume fields of this Guide. As these fields are project specific with no standard codification system, mapping is not required.
- c) Software (and its version if applicable) by which a model is produced shall be automatically identified by the BIM DR system. Therefore, the Software Version as in Field 6 of the naming convention of ArchSD SE Guide need not be provided to the BIM DR. The software versions could be exported from the BIM DR upon request.

3.4. Fields that Needs to be Mapped

The nature of Field 5 File Usage is equivalent to the Type field which is adopted as Field 6.1 of this Guide. It is suggested that the list of standard codes for Type to be extended in the future to incorporate the File Usage codes from ArchSD SE.

Table App XII-6 Codes Mapping for ArchSD SE Guide

ArchSD SE Guide		BIM Harmonisation Guidelines	
Field 5: File Usage (2 characters)		Field 6.1 Type (2 characters)	
Codes	Definition	Codes	Definition
MO	Structural Model	M3	3D Model File
SH	Drawing Sheet Set	DR	2D Drawing Rendition (General)
CO	Combined with Structural and Drawing Sheet Set	CM	Combined Model (Combined Multidiscipline Model)

ArchSD SE Guide		BIM Harmonisation Guidelines	
Field 5: File Usage (2 characters)		Field 5.1 and 5.2 Discipline and Sub-discipline	
Codes	Definition	Codes	Definition
GI	Ground Investigation Model	SF_GI	Ground Investigation