



**SSTD-8070-0002-CONFIG Revision B-2**  
**October 2011**

National Aeronautics and  
Space Administration

**John C. Stennis Space Center**  
Stennis Space Center, MS 39529-6000

## Compliance is Mandatory

# **John C. Stennis Space Center Facilities Drafting Manual**

Original Signed By:

Scott Olive \_\_\_\_\_ 10/28/11

NASA SSC Center Operations Directorate Date  
Design & Construction Project  
Management Division

Bartt J. Hebert \_\_\_\_\_ 11/01/11  
NASA SSC Engineering & Test Date  
Directorate

Issued CEF \_\_\_\_\_ 11/02/11  
Central Engineering Files Date

Stennis Standards	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28-2011	
	Expiration Date: June 14, 2015	
Page 2 of 15		
Responsible Office: NASA Center Operations Directorate		
<b>SUBJECT: SSC Facility Drafting Manual</b>		

## Document History Log

Status/ Change/	Date	Originator/ Phone	Description
Basic	4/18/01	J. Wolfenbarger X-2304	Initial Release – supersedes SSC STD 66-600, with editing and content changes to text and organization throughout the standard.
Admin.	6/29/01	J. Wolfenbarger X-2304	Add Notice to cover page to inform readers how to access figure references.
Admin.	7/18/03	J. Kellar ext. 8-3043	Reset links for figure reference access to CAD drawings.
A	2/16/06	J. Hughes X2304	5 year review. Change notice to reflect CEF Files Manager application. Changed titles for signatures per NASA SSC organization changes.
B	12/14/09	Scott Andres Ext. 8-2933	Rewrite per NASA mandate to conform to National CADD Standard
B-1	6/14/10	Scott Andres Ext. 8-2933	Appendix A: Title block revised. Added: a. This is an example of SSTD-8070-0002-CONFIG's title block that is to be used site-wide. b. Implementation of this title block shall be completed within six (6) months of SSTD's issuance.
B-2	10/28/11	Scott Andres Ext. 8-2933	Added DDMS to Section 6.1. Appendix A: Added attributes to Title Block and removed "Implementation of this title block shall be completed within six (6) months of SSTD's issuance."

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 3 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

## Table of Contents

<b>1.0</b>	<b>INTRODUCTION.....</b>	<b>4</b>
<b>1.1</b>	<b>Purpose.....</b>	<b>4</b>
<b>1.2</b>	<b>Applicability .....</b>	<b>4</b>
<b>1.3</b>	<b>Document Control.....</b>	<b>4</b>
<b>1.4</b>	<b>Records And Forms .....</b>	<b>4</b>
<b>2.0</b>	<b>REFERENCES AND APPLICABLE DOCUMENTS .....</b>	<b>4</b>
<b>3.0</b>	<b>RESPONSIBILITIES.....</b>	<b>5</b>
<b>4.0</b>	<b>DRAWINGS – GENERAL INFORMATION.....</b>	<b>6</b>
<b>4.1</b>	<b>Documentation .....</b>	<b>6</b>
<b>4.2</b>	<b>Facilities Configuration .....</b>	<b>6</b>
<b>4.3</b>	<b>Drawing Types .....</b>	<b>6</b>
<b>4.4</b>	<b>Facilities Drawings.....</b>	<b>7</b>
<b>4.4.1</b>	<b>Vicinity Map/Drawing Index .....</b>	<b>7</b>
<b>4.4.2</b>	<b>Tabulated Drawing .....</b>	<b>7</b>
<b>4.4.3</b>	<b>Modification Drawing - EMI .....</b>	<b>7</b>
<b>4.4.4</b>	<b>Vendor Information Drawing.....</b>	<b>7</b>
<b>4.4.5</b>	<b>Specification Control Drawings (SCD) .....</b>	<b>7</b>
<b>4.4.6</b>	<b>Building Plans Drawings .....</b>	<b>8</b>
<b>4.4.7</b>	<b>Technical Systems Drawings.....</b>	<b>8</b>
<b>4.4.8</b>	<b>Civil Drawings.....</b>	<b>8</b>
<b>4.4.9</b>	<b>Architectural Drawings .....</b>	<b>8</b>
<b>4.4.10</b>	<b>Structural Drawings .....</b>	<b>9</b>
<b>4.4.11</b>	<b>Mechanical Drawings .....</b>	<b>9</b>
<b>4.4.12</b>	<b>Electrical Drawings.....</b>	<b>9</b>
<b>4.5</b>	<b>Test Site Drawings .....</b>	<b>9</b>
<b>5.0</b>	<b>DRAWING REQUIREMENTS .....</b>	<b>10</b>
<b>5.1</b>	<b>General Requirements.....</b>	<b>10</b>
<b>5.1.1</b>	<b>Back-Up Requirements .....</b>	<b>10</b>
<b>5.1.2</b>	<b>Drawing Details.....</b>	<b>10</b>
	<b>5.1.2.1 Size, Format And Title Block.....</b>	<b>11</b>
	<b>5.1.2.2 Scales .....</b>	<b>11</b>
	<b>5.1.2.3 Dimensions And Tolerances.....</b>	<b>11</b>
	<b>5.1.2.4 Revision Of Drawings .....</b>	<b>11</b>
	<b>5.1.2.5 Graphic Symbols .....</b>	<b>11</b>
	<b>5.1.2.6 Drawing Sets.....</b>	<b>12</b>
<b>6.0</b>	<b>ACRONYMS, ABBREVIATIONS AND DEFINITIONS .....</b>	<b>12</b>
<b>6.1</b>	<b>Acronyms, Abbreviations.....</b>	<b>12</b>
<b>6.2</b>	<b>Definitions.....</b>	<b>13</b>
	<b>Appendix A: Title Block.....</b>	<b>15</b>

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 4 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

## 1.0 INTRODUCTION

### 1.1 Purpose

This Stennis Space Center Standard (SSTD) establishes requirements for creating and maintaining drawings and related technical documentation produced and maintained by means of computer aided design and drafting (CADD) to define and document the configuration of facilities at Stennis Space Center (SSC).

### 1.2 Applicability

This SSTD applies to all SSC NASA organizations and contractors.

### 1.3 Document Control

This SSTD shall be controlled, maintained, and used in accordance with the requirements of SSTD-8070-0005-CONFIG.

### 1.4 Records And Forms

Records and forms identified in this SSTD shall be maintained in accordance with SPR 1440.1. All records and forms are assumed to be the latest version unless otherwise indicated. Forms may be obtained from the SSC electronic forms repository, from the SSC Forms Management Officer, or from Central Engineering Files (CEF).

## 2.0 REFERENCES AND APPLICABLE DOCUMENTS

References are assumed to be the latest edition, unless otherwise specified.

AISC 326, Detailing for Steel Construction  
ASME B1.1, Unified Inch Screw Threads  
ASME B1.5, Acme Screw Threads  
ASME B1.20.1, Pipe Threads, General Purpose  
ASME B1.20.3, Dryseal Pipe Threads (Inch)  
ASME B1.20.5, Gaging for Dryseal Pipe Threads (Inch)  
ASME B1.20.7, Hose Coupling Screw Threads  
SORD DWG 53000-E001, Standard Electrical Symbols  
SORD DWG 53000-E002, Standard Symbols Instrumentation  
SORD DWG 54000-P001, Legend for Piping Schematics  
IEEE STD 315, Graphic Symbols for Electrical and Electronics Diagrams (Including Reference Designation Letters)  
MIL-STD-12, Abbreviations for Use on Drawings, Spec STD

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 5 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

NPD 8800.14, Policy for Real Property Management  
 SOI-8080-0007, Test Site Drawings  
 SOI-8080-0015, John C. Stennis Space Center Configuration Control of Technical Systems  
 SOI-8080-0027, Engineering and Test Directorate Operations Work Control  
 SSC-97-009, Technical Systems & Facility Systems Conduit Identification Number Control  
 SSTD-8070-0004-CONFIG, Preparation of Construction Specifications  
 SPR 1440.1, Records Management Program Requirements  
 SSTD-8070-0001-CONFIG, Facilities Engineering Documentation Standard  
 SSTD-8070-0005-CONFIG, Preparation, Review, Approval and Release of SSC Standards  
 SSTD-8070-0006-CONFIG, Component Servicing Documentation  
 United States National CAD Standard

### 3.0 RESPONSIBILITIES

Responsibilities for the maintenance, control, use, and application of this SSTD are as follows:

- a. The NASA SSC Center Operations Directorate, Design and Construction Project Management Division is primarily responsible for the content of this SSTD; however, the review, revision and approval of all changes to this SSTD will be in accordance with SSTD-8070-0005-CONFIG.
- b. The Facility Operating Services Contractor (FOSC) Engineering Department is responsible for the maintenance of this SSTD in accordance with SSTD-8070-0005-CONFIG.
- c. NASA SSC Engineering and Test Directorate (E&TD) Design & Analysis Division is responsible for mechanical and electrical systems design and analysis and the development and standardization of the Test Site Drawings per SOI-8080-0007; and the E&TD Test Director maintains approved Engineering Release Test Site Drawings to as-built configuration in accordance with this document, SOI-8080-0015 and SOI-8080-0027. For contractor-operated test support facilities, the NASA site manager is responsible for this work.
- d. CADD supervision and CEF are responsible for maintaining libraries, directories, and procedural guidelines as specified in this SSTD.

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 6 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

## 4.0 DRAWINGS – GENERAL INFORMATION

### 4.1 Documentation

Documentation of all SSC facility engineering drawings related to configuration control including, but not limited to, numbering systems, document revisions and cancellations shall be handled in accordance with this document and SSTD-8070-0001-CONFIG, Facilities Engineering Documentation Standard. This system applies to all SSC NASA organizations, resident agencies and contractors involved with design, implementation, operation and documentation of configuration changes.

### 4.2 Facilities Configuration

The design package for construction of new or modified facilities is comprised of the set of drawings based on National CAD Standard (NCS) procedures and format. The construction specification, an engineering document, will provide clear, accurate descriptions of technical requirements for items, materials, utilities and services, including procedures by which it will be determined that design requirements have been met. If ever drawings and specifications conflict, the specifications govern.

### 4.3 Drawing Types

Various types of drawings are required to define the construction requirements of any sizable facility. Most detailed facilities drawings are prepared to delineate the work of a single contractor or subcontractor. Drawings are also required for installation of associated components, such as conduits and electrical outlets, or for setting sleeves in the floor for pipe penetrations. All drawings that affect day-to-day test facility operations are considered to be Test Site Drawings.

There are two types of drawings at SSC:

- a. Facilities Drawings
  1. Drawings that are generally applicable to all, or the majority, of the engineering disciplines and/or to all areas of facilities.
  2. Drawings that deal specifically with a particular engineering discipline.
- b. Test Site Drawings
  1. NASA-managed test facilities (e. g. E-Complex).
  2. Support contractor-managed test support facilities (e.g. gas house, etc.).
  3. Test contractor operated facilities (e.g. A/B test stands).

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 7 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

## 4.4 Facilities Drawings

### 4.4.1 Vicinity Map/Drawing Index

The vicinity map, and its accompanying Fee Area map, are located on the left side of the first drawing sheet and illustrate the SSC site, identifying the main structures on the site and delineating its relationship to features of the surrounding area. The drawing index is a listing of each drawing included in the set and begins to the right of the vicinity map. These are not required for shop packages unless otherwise specified. For design packages, refer to NCS requirements.

### 4.4.2 Tabulated Drawing

The differences (variables) between the items defined by a tabulated drawing shall be tabulated and fixed (constant) characteristics; and be depicted or stated only once. For design packages, refer to NCS requirements.

### 4.4.3 Modification Drawing - EMI

Modification drawings establish the requirements for a modification to a facility or a system. They shall completely define the modification to be made, with sufficient description of the existing facility to ensure continuity between the modified and unchanged areas. In addition, appropriate methods shall be used to differentiate between the modified and existing facility. The EMI Form SSC-151 series is the primary modification document and shall be prepared by the assigned Design Engineer. For design packages, refer to NCS requirements.

### 4.4.4 Vendor Information Drawing

A vendor information drawing is supplied to a vendor to set forth the general requirements of an item to be fabricated. It will not be necessary to repeat circuitry or other detail information on facilities drawings when complete vendor drawings have been furnished. A vendor information drawing shall show only the dimensions, contour, and design data necessary to meet design requirements. For design packages, refer to NCS requirements.

### 4.4.5 Specification Control Drawings (SCD)

SCDs are prepared to define the specifications required for critical components purchased for SSC. They shall provide adequate information to effectively control the configuration to ensure the component's performance, interchangeability, and reliability. For design packages, refer to NCS requirements.

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 8 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

#### 4.4.6 Building Plans Drawings

Building plan drawings are maintained in conjunction with the Building Plans Manual to define the latest building configurations and space allocations. Drawings shall be prepared on the SSC Engineering CADD System in the "F" (28" x 40") size format, unless another format is specified. All text shall be on a separate layer in the CADD database. For design packages, refer to NCS requirements.

#### 4.4.7 Technical Systems Drawings

The technical system drawings include, but are not limited to, advanced schematics, advanced schematics-instrumentation, block diagram, cable and wire schedules, conduit schedules, installation and equipment drawings, interconnection wiring diagrams, wiring diagrams and wiring termination sheets. Technical systems drawing shall adhere to NCS requirements.

#### 4.4.8 Civil Drawings

Civil drawings are graphic, symbolic representations of existing and/or planned surface features of a region showing the necessary construction required to develop a site. Natural and manmade features or objects (e.g. hills, streams, buildings and structures, power transmission lines, and railroads) are shown and their geometric configuration and physical relationship to other structures and boundary lines are indicated. Certain important imaginary lines (e.g. community, property, and zoning boundaries) are also indicated for record and reference purposes. In the general planning and layout of construction required to develop a site, drawings are included which depict structure location, grading, roads and paving, underground piping, yard structures, etc. For design packages, refer to NCS requirements.

#### 4.4.9 Architectural Drawings

Architectural drawings graphically display the architectural requirements for buildings and other structures (including the magnitude, appearance, interior and exterior materials, and location) and for construction details of walls, partitions, foundations, floors, etc., and for the location and/or details of equipment such as lockers, shelves, tables, etc. These drawings depict the relationship of all components, plus all other nonstructural details, such as wall and roof materials and application, stair and handrail details, window and louver installation, suspended or acoustical ceiling details, built-in counters, cabinets, and all other miscellaneous steel and iron work. For design packages, refer to NCS requirements.

This is an uncontrolled document when printed. Verify that the document is current before use.



Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 9 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

#### 4.4.10 Structural Drawings

Structural concrete, structural steel and structural shop drawings are engineering drawings that graphically display such items as framing for buildings and other structures, and the construction details for bridges, barges, and many other facilities components. These drawings establish the basis for the construction of the structural components of facilities. The delineation of structural drawings, by the use of symbols, dimensions, specifications, schedules, and reference codes describe the size and placement of beams, reinforcing steel, concrete, rivets, welds, and columns. For design packages, refer to NCS requirements.

#### 4.4.11 Mechanical Drawings

Mechanical flow diagrams, instrument drawings and pipe drawings graphically display piping to convey solids, liquids, or gases, the construction details for mechanical devices and air-conditioning installations, and the construction details for tanks, fire protection systems. These drawings establish the requirements for construction and/or planning of interrelated elements of the facility design including pertinent services, equipment, and other features required to ensure the performance of the mechanical equipment. For design packages, refer to NCS requirements and SSC DWG 54000-P001.

#### 4.4.12 Electrical Drawings

Electrical drawings provide a basis for showing the general physical location and arrangement of the required wiring system; and identifying the physical requirements for various types of materials needed to provide the electrical installation in building. For design packages, refer to NCS requirements.

### 4.5 Test Site Drawings

For NASA operated test facilities, E&TD personnel are responsible for drawing preparation. For contractor-operated test support facilities and contractor operated test facilities, contractor personnel are responsible for drawing preparation.

- a. The mechanical design engineer develops test site drawings (i.e. MSKs, FSKs, ISKs and PSKs) through the design, analysis and drafting process and is responsible for the overall content of the mechanical systems design and mechanical test site drawings. For design packages, refer to NCS requirements, SSC DWG 54000-P001, and SOI-8080-0007.
- b. The electrical design engineer develops the electrical, data acquisition, controls and ancillary systems designs (i.e. ESKs) through the design, analysis and drafting process and is responsible for the overall content of the electrical systems

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 10 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

design and electrical test site drawings. For design packages, refer to NCS requirements, SSC DWG 54000-E001 and SOI-8080-0007.

## 5.0 DRAWING REQUIREMENTS

A set of drawings shall establish all the interrelated elements of the design, including pertinent services, equipment, utilities, and other engineering features. General requirements and principles applicable to all drawings shall follow the National CADD Standard unless otherwise stated.

### 5.1 General Requirements

The prime objective of drafting drawings is to convey to the user complete, accurate, concise, and clear information, with a minimum of drafting time. Proper planning, elimination of non-essentials, use of all available tools, and increased knowledge of the purpose of the drawings are the basis of functional drafting, and when implemented properly, will reduce drafting time and provide drawings that are easily interpreted. The drafter shall use the National CADD guidelines to ensure that the drawing provides exactly the amount of uniform detail required to convey the design, and to construct.

#### 5.1.1 Back-Up Requirements

The basic records retention policy of 100% redundancy shall be used for back-up procedures. All active user files and the holding files should be backed-up daily. All files should be backed-up weekly or as often as the holding files are purged. All files should be backed-up at least monthly. Disregarding work performed within the last 24-hour period (prior to daily back-up), there should at all times be at least two copies of all essential files: one on the database and one on storage. The most recent back-up should be stored in a fire resistant cabinet.

#### 5.1.2 Drawing Details

CADD supervision shall be responsible for developing standard practices and procedures for the use of layers, colors, and similar devices based on NCS requirements in order to minimize unique and individual approaches to the creation of drawings, parts, and models. Standard details shall be used and standard libraries developed and maintained. For design packages, refer to NCS requirements.

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 11 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

#### **5.1.2.1 Size, Format And Title Block**

- a. Standard size and design formats shall be developed for CADD use based upon NCS requirements for design packages.
- b. Only the title block referenced in Appendix A of this document shall be used.
- c. These standard formats shall be stored in a format directory and copied for use as needed.
- d. Once approved for use by CEF, no other formats shall be used.

#### **5.1.2.2 Scales**

Drawing delineation shall be to a definite scale(s), with exceptions indicated as "NTS" (not to scale), in order to quickly convey the true proportions of that which is represented. Diagram drawings, certain pictorial drawings, and portions of other drawings that are tabulated or contain break lines are exempted. For design packages, refer to NCS requirements.

#### **5.1.2.3 Dimensions And Tolerances**

The general principles of dimensioning and tolerancing are used to define the geometric characteristics of objects delineated on facility drawings. Refer to NCS requirements for dimensioning and tolerances.

#### **5.1.2.4 Revision Of Drawings**

Revising facilities drawings is accomplished by identifying and recording revisions on drawings using the proper requirements and methods. Revisions shall be authorized by a properly designated individual before changes to the drawing are initiated. The formal drawing change procedure shall follow the National CADD Standard.

#### **5.1.2.5 Graphic Symbols**

Graphic symbols shall be used in accordance with NCS to avoid misinterpretation. Unless otherwise specified, any changes or revisions to an existing drawing, specification, standard, or technical document prepared under a previous edition of this standard or superseded military standard may use the latest graphic symbols, although the superseded graphic symbols may appear elsewhere in the document or drawing. For symbol legends, refer to NCS requirements.

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 12 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

### 5.1.2.6 Drawing Sets

Drawings prepared for the various craft work are supplementary to each other and are assembled in groups that correspond to the engineering discipline or to the engineering function to which they apply. When joined with the vicinity map/drawing index, and numerically arranged using the NCS numbering system, they constitute a facilities drawing set. Drawings are customarily bound in sets prior to release for bidding or other purposes. For design packages, refer to NCS requirements.

## 6.0 ACRONYMS, ABBREVIATIONS AND DEFINITIONS

### 6.1 Acronyms, Abbreviations

&	And
A & E	Architectural & Engineering
A-E	Architect-engineer
AIA	American Institute of Architects
AISC	American Institute of Steel Construction
ANSI	American National Standards Institute
ASME	American Society of Mechanical Engineers
AWS	American Welding Society
C of E	Corps of Engineers
CADD	Computer-Aided Design and Drafting
CEF	Central Engineering Files
DDMS	Data Design Management System
Doc.	Document
EMI	Engineering Modification Instruction
ETD	Engineering and Test Directorate (NASA)
FOSC	Facility Operating Services Contractor
HVAC	Heating, Ventilating and Air Conditioning
LEED	Leadership in Energy and Environmental Design
MIL	Military
NASA	National Aeronautics and Space Administration
NCS	United States National CAD Standard
NPD	NASA Policy Directive
SCD	Specification Control Drawing
SOI	John C. Stennis Space Center Organizational Instruction
SORD	Site-wide Operation Repair Documentation
SPR	John C. Stennis Space Center Procedural Requirement
SSC	John C. Stennis Space Center
SSTD	John C. Stennis Space Center Technical Standard

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 13 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

STD	Standard
SWR	Stennis Work Request
TOC	Test Operations Contractor
USGBC	United States Green Building Council
USGS	United States Geological Survey

## 6.2 Definitions

Architectural Drawing:	A graphic display of the architectural requirements for buildings and other structures.
Building Plan:	In conjunction with the Building Plans Manual, this defines the latest building configurations and space allocations.
Civil Drawing:	Graphic, symbolic representation of existing and/or planned surface features of a region showing the necessary construction required to develop a site.
Drawing Index:	A listing of each drawing included in the set
Electrical Drawing:	Shows the general physical location and arrangement of the required wiring system; and identifies the physical requirements for various types of materials needed to provide the electrical installation for a structure.
Mechanical Drawing:	A graphic display of piping to convey solids, liquids, or gases, the construction details for mechanical devices and air-conditioning installations, and the construction details for tanks, fire protection systems, etc.
Facility Sketches (FSKs):	Includes heritage A/B Test Complex process piping drawings. Not recommended for new drawings.
Electrical Sketches (ESKs):	Includes electrical plans, panel arrangements, advanced schematics, cabling diagrams, wiring diagrams, facility wiring diagrams, and wire termination sheets for the Test Site.
Instrumentation Sketches (ISKs):	Includes instrumentation advanced schematics, diagrams and drawings, consisting primarily of heritage drawings in A/B Test Complex. Not recommended for new drawings.

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG	B-2
	<i>Number</i>	<i>Rev.</i>
	Effective Date: October 28, 2011	
	Expiration Date: June 14, 2015	
Page 14 of 15		
Responsible Office: NASA SSC Center Operations Directorate		
<b>SUBJECT: SSC Facilities Drafting Manual</b>		

Mechanical Sketches (MSKs):	Includes detailed mechanical fabrication drawings, piping, pipe supports and structural drawings for the Test Site.
Piping Sketches (PSKs):	Process piping drawings for the Test Site; also referred to as P&IDs.
Structural Concrete Drawing:	Graphically displays facility components constructed of concrete.
Modification Drawing (EMI):	Shows the modification to be made, with sufficient description of the existing facility to ensure continuity between the modified and unchanged areas.
Specification Control Drawing (SCD):	Shows the specifications required for critical components purchased.
Structural Steel Plan:	A plan that shows the primary and secondary structural steel.
Tabulated Drawing:	The variables between items shall be tabulated, and constant characteristics shall be depicted or stated only once in this drawing.
Tolerance:	The total amount by which a specific dimension may vary from design size.
Vendor Information Drawing:	Supplied to a vendor to set forth the general requirements of an item to be fabricated.

This is an uncontrolled document when printed. Verify that the document is current before use.

Stennis Standard	SSTD-8070-0002-CONFIG B-2
	<i>Number</i> <span style="float: right;"><i>Rev.</i></span>
	Effective Date: October 28, 2011
	Expiration Date: June 14, 2015
Page 15 of 15	
Responsible Office: NASA SSC Center Operations Directorate	
<b>SUBJECT: SSC Facilities Drafting Manual</b>	

### Appendix A: Title Block

This is an example of SSTD-8070-0002-CONFIG's title block that shall be used site-wide.

		AUTHORIZATION		ISSUE DATE	ISSUED BY
SYM	ZONE	DESCRIPTION		DATE	APPROVED
REVISIONS					
SIGNATURES		DATE		NATIONAL AERONAUTICS AND SPACE ADMINISTRATION  JOHN C. STENNIS SPACE CENTER SSC, NO 39529-6000 ‡ DESCRIPTION TITLE1 TITLE2 TITLE3 TITLE4 TITLES	
DRAWN	DRAWN_BY	DRAWN	DRAWN_DATE		
CHECKED	CHECKED_BY	CHECKED	CHECKED_DATE		
ENGINEER	ENGINEER1	ENGINEER	ENGINEER_DATE1		
ENGINEER	ENGINEER2	ENGINEER	ENGINEER_DATE2		
ENGINEER/ENVIRONMENTAL	ENGINEER/ENVIRONMENTAL	ENGINEER/ENVIRONMENTAL	ENGINEER/ENVIRONMENTAL_DATE3		
SITE MANAGER/FACILITY MANAGER	SITE MANAGER	SITE MANAGER	SITE MANAGER_DATE		
CONCURRENCE	CONCURRENCE	CONCURRENCE	CONCURRENCE_DATE		
SUBMITTED	SUBMITTED_BY	SUBMITTED	SUBMITTED_DATE		
SAFETY	SAFETY	SAFETY	SAFETY_DATE		
APPROVED	APPROVED	APPROVED	APPROVED_DATE	ISSUE DATE	ISSUED_BY
		SIZE	DWG NO.	‡ DRAWING_NUMBER	DWG NO.
		F		DRAWING_#	SHT
		SECURITY	ISSUED_CEF_DATE	AUTHORITY	REV
				AUTHORITY_NAME	SHEET
					L_OF
4		3 REF_INFO		2	
				1	

‡ Signifies hidden attributes and will not be viewed or printed on final hardcopy drawing. These are primarily being used for DDMS search capabilities.

This is an uncontrolled document when printed. Verify that the document is current before use.