Voluntary Hospital Price Transparency Machine-Readable File Sample Format Data Dictionary (Wide Format, Version 1.0)

The Centers for Medicare and Medicaid Services (CMS) has provided a voluntary Machine-Readable File (MRF) sample format that we believe will assist hospitals in satisfying the requirement to make clear, accessible pricing information available online about the items and services they provide, while also providing consistency in how these disclosures are viewed by consumers. The sample format was developed based on input and recommendations provided to CMS from a technical expert panel comprised of industry experts including hospitals, researchers, and innovators that was convened by a CMS contractor. Hospitals may use this optional sample format to satisfy the MRF requirements found at 45 CFR 180.50.

This data dictionary is an educational supplement to the sample format designed to illustrate and explain how to incorporate hospital data into it and includes definitions, data types, format, and valid values for each data element (also referred to as column headers for CSV formats). The valid values define the format or "what" may be entered under each data element. In situations where there is no applicable information, insert "-1" in the cell. At the end of this document examples have been provided to help hospitals input information. The use of this sample format is voluntary. The data elements for this sample format are noted alongside the 'Data Element Name'.

Data Element Name: *Hospital Name*
Header for .csv File: hospital_name
JSON Attribute: hospital_name
Definition: The legal business name of the hospital associated with the file.
Data Type: Alphanumeric
Format: String
Maximum Length: 120
Valid Values: Any string

Data Element Name: *Hospital File Date*
Header for .csv File: last_updated_on
JSON Attribute: last_updated_on
Definition: Date on which the file was last updated.
Data Type: Date
Format: SO 8601 format (i.e. YYYY-MM-DD)
Maximum Length: 10
Valid Values: 2022-01-01
Requirement: 45 CFR § 180.50 (e)

Data Element Name: *Version*
Header for .csv File: version
JSON Attribute: version

Definition: The version of the sample format used
Data Type: Alphanumeric
Format: String
Valid Values: Any string
Example Value: 1.0.0

Data Element Name: *Hospital Location*
Header for .csv File: hospital_location
JSON Attribute: hospital_location
Definition: The unique name of the location of the hospital, absent any acronyms. If the MRF contains identical standard charges for multiple hospital locations, separate the name of each location with a "|".
Data Type: Alphanumeric
Format: String
Maximum Length: 120
Valid Values: Any string
Example Value: Hospital Lakeview | Hospital Forrestal

Data Element Name: *Hospital Financial Aid Policy*
Header for .csv File: financial_aid_policy
JSON Attribute: financial_aid_policy
Definition: The hospital's financial aid or cash price policy that is applied to items and services. This could include information such as cash price policies that may be tiered or based on income levels, or other requirements. This can be displayed as a link to the hospital's website.
Data Type: Alphanumeric
Format: String
Valid Values: Any string

Data Element Name: *Hospital Licensure Number*
Header for .csv File: license_number | state
Header .csv example: license_number | CA
JSON Attribute: license_number
state
Definition: The hospital license and the abbreviated state of licensure for the hospital location associated with the file.
Data Type: Alphanumeric
Format: String
Valid Values: Any string

Example Value: 1234567890

Data Element Name: *Description (required, as applicable)*
Header for .csv File: description
JSON Attribute: description
Definition: Description of each item or service as defined at 45 CFR 180.20. If there is no applicable data for this data element, insert "-1" into the cell.
Data Type: Alphanumeric
Format: String
Maximum Length: 120 (suggested max, but can be longer)
Valid Values: Any string
Requirement: 45 CFR § 180.50 (b)(1)

Data Element Name: *Code * (required, as applicable)*
Header for .csv File: code|[i]
Header .csv Example: code|1
code|2
code|3
JSON Attribute: code
Definition: Any code used by the hospital for purposes of accounting or billing for the item or service, including, but not limited to, the Current Procedural Terminology (CPT) code, the Healthcare Common Procedure Coding System (HCPCS) code, the Diagnosis Related Group (DRG), the National Drug Code (NDC), or other common payer code (see 45 CFR 180.50 (b)(7)). For example, 99215. If there is no applicable data for this data element, insert "-1" into the cell.
Data Type: Alphanumeric
Format: String
Maximum Length: 12 (suggested max, but can be longer)
Valid Values: Corresponding code used by the hospital for purposes of accounting or billing.
Requirement: 45 CFR 180.50 (b)(7)
**This data element (or column in CSV files) repeats for as many different codes are involved in the defining of the standard charges.*

Data Element Name: *Code Type **
Header for .csv File: code|[i]|type
Header .csv Example: code |1| type
JSON Attribute: type

Definition: The associated coding type, such as MS-DRG, CPT, HCPCS, etc., for the 'Code' data element. We recommend using "LOCAL" (e.g., internal) codes in conjunction with other code sets. However, if no other codes are available for that particular item or service, "LOCAL" codes may be used as a valid value.

Data Type: Enum

Format: String

Valid Values: "CPT", "HCPCS", "ICD", "MS-DRG", "R-DRG", "S-DRG", "APS-DRG", "AP-DRG", "APR-DRG", "APC", "NDC", "HIPPS", "LOCAL", "EAPG", "CDT", "RC", "CDM"

**This data element (or column in CSV files) repeats for as many different codes are involved in the defining of the standard charges.*

Data Element Name: *Billing Class*

Header for .csv File: billing_class

JSON Attribute: billing_class

Definition: Indicates whether the charge is for a professional or facility item or service.

Data Type: Enum

Format: String

Valid Values: "Professional" or "Facility"

Data Element Name: *Setting (required, as applicable)*

Header for .csv File: setting

JSON Attribute: setting

Definition: The inpatient or outpatient setting that corresponds to the standard charge for the item or service. If there is no applicable data for this data element, insert "-1" into the cell.

Data Type: Enum

Format: String

Valid Values: "inpatient" "outpatient" "both" "-1"

Requirement: 45 CFR § 180.50 (b)(2-6)

Data Element Name: *Drug Unit of Measurement*

Header for .csv File: drug_unit_of_measurement

JSON Attribute: unit

Definition: If the item or service has different standard charges based on various units, disclose the unit values here.

Data Type: Alphanumeric
Format: String
Maximum Length: 13 (suggested max, but can be longer)

Data Element Name: *Drug Type of Measurement*
Header for .csv File: drug_type_of_measurement
JSON Attribute: type
Definition: If the item or service has different standard charges based on various units, insert the unit type here. Valid values include GR – Gram, ME – Milligram, ML – Milliliter, and UN – Unit.
Data Type: Alphanumeric
Format: String
Maximum Length: 2 (suggested max, but can be longer)
Valid Values: "GR", "ME", "ML", "UN"

Data Element Name: *Modifiers*
Header for .csv File: modifiers
JSON Attribute: modifiers
Definition: If a standard charge for a code is dependent on a modifier for the reported item or service, then the modifier code should be included to provide additional context. If multiple modifier codes are applied to the same item or service, separate each modifier with a pipe "|".
Data Type: Alphanumeric
Format: String
Example Value: 50 | 62

Data Element Name: *Gross Charge (required, as applicable)*
Header for .csv File: standard_charge|gross
JSON Attributes: *gross_charge*
Definition: Gross charge that applies to each individual item or service. Gross charge is defined as the charge for an individual item or service that is reflected on a hospital's chargemaster, absent any discounts (see 45 CFR 180.20). If there is no applicable data for this data element, insert "-1" into the cell.
Data Type: Numeric
Format: Float (e.g., 9999.99)
Maximum Length: Not Applicable
Valid Values: Positive numbers or "-1"
Requirement: 45 CFR § 180.50 (b)(2)

Data Element Name: *Discounted Cash Price (required, as applicable)*

Header for .csv File: standard_charge|discounted_cash
JSON Attributes: *discounted_cash*
Definition: Discounted cash price that applies to each item or service. Discounted cash price is defined as the charge that applies to an individual who pays cash (or cash equivalent) for a hospital item or service (see 45 CFR 180.20). If a hospital has established financial aid arrangements or other discounts based on a patient's ability to pay, disclose the policy or link to the policy using the 'Hospital Financial Aid Policy' data element if available. If there is no applicable data for this data element, insert "-1" into the cell.
Data Type: Numeric
Format: Float (e.g., 9999.99)
Maximum Length: Not Applicable
Valid Values: Positive numbers or "-1"
Requirement: 45 CFR § 180.50 (b)(6)

Data Element Name: *Payer-specific Negotiated Charge: Dollar Amount * (required, as applicable)*
Header for .csv File: standard_charge|[payer_name]|[plan_name]
Header .csv Example: standard_charge|Payer_X|ChoicePPO
JSON Attribute: standard_charge
Definition: Payer-specific negotiated charge (expressed as a dollar amount) that applies to each item or service. Each payer-specific negotiated charge must be clearly associated with the name of the third-party payer and plan. Payer-specific negotiated charge is defined as the charge that a hospital has negotiated with a third-party payer for an item or service (see 45 CFR 180.20). We recommend that hospitals use the full name of the payer organization as stated in the contract, absent any abbreviations. If there is no applicable data for this data element, insert "-1" into the cell.
Data Type: Numeric
Format: Float (e.g., 9999.99)
Maximum Length: Not Applicable
Valid Values: Positive numbers or "-1"
Requirement: 45 CFR § 180.50 (b)(3)
**Data element (or column in CSV files) repeats for as many payers and plans with which the hospital has negotiated a payer-specific standard charge for items or services.*

Data Element Name: *Payer-specific Negotiated Charge: Percentage* (required, as applicable)*
Header for .csv File: standard_charge| [payer_name] | [plan_name] | percent
Header .csv Example: standard_charge| Payer_X | Choice_PPO | percent

JSON Attribute: standard_charge_percent

Definition: Payer-specific negotiated charge (expressed as a percentage) that applies to each item or service. A payer-specific negotiated charge that is expressed as percentage should be used when the payer-specific negotiated charge cannot be displayed as a single dollar amount and is based on a percentage defined in the payer contract, for example a percentage of total billed charges. This data element will contain the numeric representation of the percentage as a whole number (70.5% is to be entered as "70.5" and not ".705"). Each payer-specific negotiated percentage charge must be clearly associated with the name of the third-party payer and plan. We recommend that hospitals use the full name of the payer organization as stated in the contract, using underscores to indicate spaces between words, and absent any abbreviations. If there is no applicable data for this data element, insert "-1" into the cell.

Data Type: Numeric

Format: Float (e.g., 9999.99)

Maximum Length: Not Applicable

Valid Values: Positive numbers or "-1"

Requirement: 45 CFR § 180.50 (b)(3)

** Data element (or column in CSV files) repeats for as many payers and plans with which the hospital has negotiated percentage amount for the inpatient or outpatient standard charge for items and services.*

Data Element Name: *De-identified Minimum Negotiated Charge (required, as applicable)*

Header for .csv File: standard_charge | min

JSON Attribute: minimum

Definition: De-identified minimum negotiated charge that applies to each item or service. De-identified minimum negotiated charge is defined as the lowest charge as expressed as a dollar amount that a hospital has negotiated with all third-party payers for an item or service (see 45 CFR 180.20). If there is no applicable data for this data element, insert "-1" into the cell.

Data Type: Numeric

Format: Float (e.g., 9999.99)

Maximum Length: Not Applicable

Valid Values: Positive numbers or "-1"

Requirement: 45 CFR § 180.50 (b)(4)

Data Element Name: *De-identified Maximum Negotiated Charge (required, as applicable)*

Header for .csv file: standard_charge | max

JSON Attribute: maximum

Definition:	De-identified maximum negotiated charge that applies to each item or service. De-identified maximum negotiated charge is defined as the highest charge that a hospital has negotiated with all third-party payers for an item or service (see 45 CFR 180.20). If there is no applicable data for this data element, insert "-1" into the cell.
Data Type:	Numeric
Format:	Float (e.g., 9999.99)
Maximum Length:	Not Applicable
Valid Values:	Positive numbers or "-1"
Requirement:	45 CFR § 180.50(b)(5)

Data Element Name:	*Contracting Method* *
Header for .csv File:	standard_charge |[payer_name] | [plan_name] | contracting_method
JSON Attribute:	contracting_method
Definition:	The type of contract arrangement associated with the payer specific negotiated arrangement.
Data Type:	Enum
Format:	String
Maximum Length:	Not Applicable
Valid Values:	"capitation", "case rate", "fee schedule", "percent of total billed charge", "per diem", "other". If selecting "other", define it in the 'Additional Payer Specific Notes' data element.

**Data element (or column in CSV files) repeats for as many payers and plans with which the hospital has negotiated a payer-specific standard charge for items or services.*

Instructions and Definitions for Contracting Method Valid Values:

Select the value that most closely represents the contracting method for the payer-specific negotiated charge associated with the item or service. If the contracting method isn't represented in the below definitions, select 'Other' and include a detailed explanation of the contracting arrangement in the 'Additional Payer Specific Notes' data element. The 'Additional Payer Specific Notes' data element may also be utilized to add specific detail on the contracting methods.

- Capitation: A flat rate agreed upon by the payer and provider to cover the cost of a health plan member's healthcare services for a designated length of time.
- Case Rate: A flat rate for a package of items and services triggered by a diagnosis, treatment, or condition for a designated length of time. Additional information about the case rate can be entered into either the 'Additional Payer Specific Notes' or 'Additional Generic Notes' data element.
- Fee Schedule: The standard charge for an item or service that is based on a fee schedule. Examples of common fee schedules include: Medicare, Medicaid, commercial payer, and workers compensation. The dollar amount that is based on the indicated fee

schedule should be entered into the 'Payer-specific Negotiated Charge: Dollar Amount' data element. This includes dollar amounts for arrangements that are based on a percentage of the gross charge for the item or service described.

- Percentage of Total Billed Charges: The payer-specific negotiated charge is based on a percentage of the total billed charges for the described item or service. This percentage may vary depending on certain pre-determined criteria being met. Please include this additional information in the 'Payer-specific Negotiated Charge: Percentage' data element.
- Per Diem: The per day charge for the described item or service. Tier rates can be disclosed in the 'Additional Payer Specific Notes' data element or can be added as a separate distinct service if applicable. For example, Service A 1-3 days, Service A 4-7 days. See an example implementation below.
- Other: If the contracting method for a particular item or service cannot be described by one of the definitions above, select 'Other' and please include a detailed explanation of the contracting arrangement in the 'Additional Payer Specific Notes' data element.

Data Element Name: *Additional Payer Specific Notes **

Header for .csv File: additional_payer_notes | [payer_name] | [plan_name]

JSON Attribute: additional_payer_notes

Definition: A free text data element to use to help explain any of the data in the file that may be related to a payer-specific negotiated charge. There may be situations where additional notes are necessary to disclose information such as a standard charge that is based on an algorithm that cannot be represented by a dollar amount or percentage.

Data Type: Alphanumeric

Format: String

Maximum Length: Not Applicable

** Data element (or column in CSV files) repeats for as many payers and plans with which the hospital has negotiated a payer-specific standard charge for items or services.*

Data Element Name: *Additional Generic Notes*

Header for .csv File: additional_generic_notes

JSON Attribute: additional_generic_notes

Definition: A free text data element to help explain any of the data in the file – such as why a specific standard charge may not be applicable for an item or service, other contracting arrangement, or further description to support understanding of the hospital's standard charges.

Data Type: Alphanumeric

Format: String

Maximum Length: Not Applicable

Example – Algorithm in 'Additional Payer Specific Notes' Data Element

If the standard charge is a case rate coupled with an additional amount determined by an algorithm (e.g., $5000 plus 60% of the total implant cost), post the case rate in the Payer-specific Negotiated Charge: Dollar Amount' data element (header of *standard_charge|Payer_A|Plan_1* in the below example*)* and use the 'Additional Payer Specific Notes' data element to indicate the additional algorithm, i.e., "plus 60% of total implant cost." See below for a simplified illustrative example:

<table>
<tr><th>Description</th><th>standard_charge|
Payer_A|Plan_1</th><th>standard_charge|Payer_A
|Plan_1|contracting_method</th><th>additional_payer_notes|
Payer_A|Plan_1</th></tr>
<tr><td>Procedure X</td><td>5000</td><td>case rate</td><td>+ 50% of total implant cost</td></tr>
<tr><td>Procedure Y</td><td>5000</td><td>case rate</td><td>+ 60% of total implant cost</td></tr>
<tr><td>Implantable device 1</td><td>500</td><td>fee schedule</td><td></td></tr>
<tr><td>Implantable device 2</td><td>750</td><td>fee schedule</td><td></td></tr>
</table>

Example –Fee Schedule

In this example, the contract indicates that for Procedure X, the hospital is reimbursed at 150% of the Hospital's own Medicare reimbursement rate. The dollar amount of the 150% is required to be calculated and entered in the 'Payer-specific Negotiated Charge: Dollar Amount' data element (in this example, that is $5000). Optionally, the 'Payer-specific Negotiated Charge: Percent' data element may be populated with the percent and the 'Additional Payer Specific Notes' with the referenced fee schedule to provide additional context for the consumers of the file.

<table>
<tr><th>Description</th><th>standard_charge
|Payer_A|Plan_1</th><th>standard_charge|Payer_A
|Plan_1|contracting_method</th><th>standard_charge
|Payer_A
|Plan_1|percent</th><th>Additional_payer_notes
| Payer A | Plan_1</th></tr>
<tr><td>Procedure X</td><td>5000</td><td>fee schedule</td><td>150</td><td>150% of Hospitals Specific Medicare Reimbursement Rate</td></tr>
</table>

Example – Percentage of total billed charges

In scenarios where contracts are structured such that items or services are reimbursed based on a percentage of the total billed charges, calculating a dollar amount prior to a bill submitted

may not be possible. The value entered into the 'Standard Charge' data element will be "-1" to indicate there is no applicable data. The percentage number that the contract is based on is entered in the 'Payer-specific Negotiated Charge: Percent' data element. In this example, Procedure X is reimbursed 75% of total billed charges. Enter the percent as a whole number, "75", and not "0.75".

Description	*standard_charge|Payer_A|Plan_1*	*standard_charge|Payer_A|Plan_1|percent*	*standard_charge|Payer_A|Plan_1|contracting_method*
Procedure X	-1	75	percentage of total billed charges

Example – Per Diem

Per diem arrangements often have different contractual reimbursement rates depending on the number of days for the service. In the below example, "Procedure X" has three different rates depending on the number of days. The first three days are a $5,000 standard charge, the next four days are a $6,000 charge, and any amount of time after is $7,000. This can be represented as follows:

Description	*standard_charge|Payer_A|Plan_1*	*standard_charge|Payer_A|Plan_1|contracting_method*	*additional_payer_notes|Payer_A|Plan_1*
Procedure X, days 1-3	5000	per diem	Per diem cost for the first three days of hospitalization.
Procedure X, days 4-7	6000	per diem	Per diem cost for days 4-7.
Procedure X, days 7+	7000	per diem	Any LOS exceeding 7 days is $7000 per diem.

Example – Other

There are likely to be scenarios where a contracting method for an item or service does not fall into one of the standard arrangements. For a contracting method that doesn't match any of the examples described above, select "other" for the contracting method, disclose the standard charge dollar amount for the payer if possible and explain the arrangement in the 'Additional Payer Specific Notes' data element.

Description	*standard_charge|Payer_A|Plan_1*	*standard_charge|Payer_A|Plan_1|contracting_method*	*additional_payer_notes|Payer_A|Plan_1*
Procedure X	5000	other	New contracting experiment trial run. Will reimburse based on a combination of quality metrics with an initial amount of $5,000.