HealthStream Regulatory Script

Medication Terminology: Use of Abbreviations & Symbols
Release Date: December 2011
HLC non-PA Version: 603
HLC PA Version: 603

Lesson 1: Introduction
Lesson 2: Risky Terms and Patient Safety
Lesson 3: Recommendations
Welcome to the introductory lesson on medication terminology.

As your partner, HealthStream strives to provide its customers with excellence in regulatory learning solutions. As new guidelines are continually issued by regulatory agencies, we work to update courses, as needed, in a timely manner. Since responsibility for complying with new guidelines remains with your organization, HealthStream encourages you to routinely check all relevant regulatory agencies directly for the latest updates for clinical/organizational guidelines.

If you have concerns about any aspect of the safety or quality of patient care in your organization, be aware that you may report these concerns directly to The Joint Commission.
### Course Rationale

Many healthcare providers use abbreviations, acronyms, and symbols when writing orders, taking notes, and documenting care. The delivery of safe patient care can be compromised if these “shortcuts” are confusing or their meaning is easily misunderstood by other caregivers.

This course will help you and your hospital improve communication and protect patient safety.

You will learn about:
- The danger of using abbreviations, acronyms, and symbols
- “Risky” [glossary] drug terms to avoid
- Safer terms to use instead

References 1, 2
### Course Goals

After completing this course, you should be able to:

- Identify The Joint Commission recommendations related to risky drug terms
- Recognize risky abbreviations and symbols
- Select safer terms to use in place of risky terms
<table>
<thead>
<tr>
<th>Course Outline</th>
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<tbody>
<tr>
<td>This lesson gave the course rationale and goals.</td>
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<tr>
<td>Lesson 2 discusses risky terms and patient safety.</td>
</tr>
<tr>
<td>Lesson 3 gives recommendations for the use of written drug terms.</td>
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<table>
<thead>
<tr>
<th>Lesson 1: Introduction</th>
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<tbody>
<tr>
<td>Lesson 2: Risky Terms and Patient Safety</td>
</tr>
<tr>
<td>- Abbreviations, Acronyms, and Symbols</td>
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<tr>
<td>- Why certain terms can be risky</td>
</tr>
<tr>
<td>- The most “risky terms”</td>
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<tr>
<th>Lesson 3: Recommendations</th>
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<tbody>
<tr>
<td>- The Joint Commission standards</td>
</tr>
<tr>
<td>- Which terms should be prohibited</td>
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</table>
Welcome to the lesson on risky terms and patient safety.

This lesson will discuss why certain terms can be risky and how their use compromises patient safety. Risky terms most frequently associated with drug errors and patient harm will be highlighted.

<table>
<thead>
<tr>
<th>Lesson 2: Risky Terms and Patient Safety</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Abbreviations, Acronyms, and Symbols</td>
</tr>
<tr>
<td>- Why certain terms can be risky</td>
</tr>
<tr>
<td>- The most “risky terms”</td>
</tr>
</tbody>
</table>
Abbreviations, Acronyms, and Symbols

Abbreviations, acronyms, and symbols are often used as shortcuts to indicate:

- Drug names
- Drug dosages
- Administration routes
- A patient’s condition

Many healthcare workers have used abbreviations during their entire career. As a result, they are reluctant or unwilling to change their practice.

However, using some abbreviations, acronyms, or symbols can result in patient injury or even death. Let’s take a closer look at why using some of these terms can be dangerous.

References 1, 3, 4
Abbreviations, acronyms, and symbols can be “risky terms” if they:

- Are not standardized and well-known by all caregivers in a hospital
- Can be easily confused with other terms
- Can be misinterpreted

For example, in a study of pediatric note-keeping 31-63% of the abbreviations used by a healthcare provider were not understood by other caregivers.

References 1, 5
Confusion or misinterpretation of risky terms can lead to patient injury or death if:

- Medications are not given to the patient.
- The patient receives the wrong drug.
- The patient receives too much or too little of the drug.
- The drug is administered in the wrong way.

References 1-3
Let’s consider a specific example:

A doctor uses the term “U” (for “unit”) when writing a drug order.

A nurse reading the order might mistake the “U” for:
- “0” (zero)
- “4” (four)
- “cc” (cubic centimeter)

This could lead to confusion. Treatment may be delayed while the nurse checks the order.

Even worse, the nurse might not check the order. He or she may misread the order and give the wrong dose. This could cause serious patient injury or death.

References 1, 2
As many as 5% of medication errors (643,151 total) reported to a medical error reporting system were attributed to the use of abbreviations that were misinterpreted.

Many of the abbreviations associated with errors were prohibited terms.

In the above study, the most common abbreviations resulting in a drug error were:

- QD
- U
- cc
- MSO4 or MS

Click on each for additional information.

Reference 6
Abbreviation errors can be made by physicians, nurses, and pharmacists.

A review of abbreviation-related errors revealed that medical staff make the most errors, followed by nurses and pharmacists.

The good news is that these errors can be prevented by avoiding the use of “risky terms” during communication.

Reference 6
You have completed the lesson on risky terms and patient safety.

Remember:
- On written documents, abbreviations, acronyms, and symbols can lead to drug errors.
- Errors can be prevented by avoiding the use of “risky terms” during communication.
Lesson 3: Recommendations

<table>
<thead>
<tr>
<th>Introduction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Welcome to the lesson on recommendations for the use of drug terms.</td>
</tr>
<tr>
<td>This lesson will review The Joint Commission standards concerning risky terms. Recommendations about how hospitals should select terms to be prohibited also will be discussed.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Lesson 2: Recommendations</th>
</tr>
</thead>
<tbody>
<tr>
<td>- The Joint Commission recommendations</td>
</tr>
<tr>
<td>- Which terms should be prohibited</td>
</tr>
</tbody>
</table>
The Joint Commission recognizes the importance of using safe drug terms.

In Standard IM.02.02.01, The Joint Commission requires hospitals to:

- Use standardized terminology, definitions, abbreviations, acronyms, symbols, and dose designations
- Follow a list of prohibited abbreviations, acronyms, symbols, and dose designations

How does a hospital determine which risky terms should be prohibited? Let's take a look on the next screens.

Reference 1, 7
### Risky Terms: Prohibited List (1)

To prevent drug errors resulting from the use of risky terms, hospitals should:

1. Identify the abbreviations, acronyms, and symbols that staff members use commonly
2. Review the list of common terms
3. Identify terms on the list that might be confusing
4. Place confusing terms on a “risky” list

References 1, 7, 8
Risky Terms: Prohibited List (2)

Hospitals may prohibit any terms from their risky list.

However, all hospitals accredited by The Joint Commission **must** prohibit certain terms.

A table of these terms appears on the following screen.

Note: In the following table, terms appear in one form (upper case, with periods between letters). Be aware that any prohibited term is prohibited in all forms:

- Upper case
- Lower case
- With periods
- Without periods

Reference 7
## Risky Terms: The Joint Commission’s Minimum List of Prohibited Terms (1)

<table>
<thead>
<tr>
<th>This prohibited term...</th>
<th>Is used to mean...</th>
<th>But could be mistaken for...</th>
<th>Therefore, this term should be written instead:</th>
</tr>
</thead>
<tbody>
<tr>
<td>U</td>
<td>Unit</td>
<td>- 0 (zero)</td>
<td>Unit</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- 4 (four)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>- cc (cubic centimeter)</td>
<td></td>
</tr>
<tr>
<td>I.U.</td>
<td>International unit</td>
<td>- IV (intravenous)</td>
<td>International unit</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- 10 (ten)</td>
<td></td>
</tr>
<tr>
<td>Q.D.</td>
<td>Once a day</td>
<td>- Q.O.D. (every other day)</td>
<td>Daily</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Q.I.D. (four times a day)</td>
<td></td>
</tr>
<tr>
<td>Q.O.D.</td>
<td>Every other day</td>
<td>- Q.D. (once a day)</td>
<td>Every other day</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Q.I.D. (four times a day)</td>
<td></td>
</tr>
<tr>
<td>MgSO₄</td>
<td>Magnesium sulfate</td>
<td>MS or MSO₄ (morphine sulfate)</td>
<td>Magnesium sulfate</td>
</tr>
<tr>
<td>MS or MSO₄</td>
<td>Morphine sulfate</td>
<td>MgSO₄ (magnesium sulfate)</td>
<td>Morphine sulfate</td>
</tr>
<tr>
<td>Using a trailing zero after a decimal point (e.g., &quot;1.0&quot;)</td>
<td>“1” (in the example given)</td>
<td>Ten-fold higher dosage (e.g., &quot;1.0&quot; could be mistaken for &quot;10&quot;)</td>
<td>Value without a trailing zero (e.g., &quot;1&quot;)</td>
</tr>
<tr>
<td>Leaving out a leading zero before a decimal point (e.g., &quot;.1&quot;)</td>
<td>“.1” (in the example given)</td>
<td>Ten-fold higher dosage (e.g., &quot;.1&quot; could be mistaken for &quot;1&quot;)</td>
<td>Value with leading zero included (e.g., &quot;0.1&quot;)</td>
</tr>
</tbody>
</table>

References 1, 2, 7, 9
Hospitals are only required by The Joint Commission to prohibit the terms on the minimum list.

However, many other terms can be risky, as well.

A table of other possible terms to avoid or prohibit appears on the following screen.

References 2, 7-9
## Risky Terms: Suggested List of Prohibited Terms

<table>
<thead>
<tr>
<th>This term...</th>
<th>Is used to mean...</th>
<th>But could be mistaken for...</th>
<th>Therefore, this term is suggested instead:</th>
</tr>
</thead>
</table>
| Ug           | Microgram          | mg (milligram), resulting in a 1000-fold overdose | - mcg  
- microgram |
| H.S.         | Half-strength      | H.S. (bedtime)               | Half-strength |
| H.S. or q.H.S.| Bedtime           | - H.S. (half-strength)       | At bedtime |
| T.I.W.       | Three times a week | - T.I.D. (three times a day)  | - 3 times weekly  
- T.W. (twice weekly)  
- Q.H. (every hour)  
- 3 times weekly |
| S.C. or S.Q. | Subcutaneous       | - S.L. (sublingual)          | Sub-Q  
- SubQ  
- Subcutaneously |
| D/C          | Discharge          | Discontinue                  | Discharge |
| c.c.         | Cubic centimeter   | U (units)                    | ml (for “milliliters”) |
| A.S.         | Left ear           | O.S. (left eye)              | Left ear |
| A.D.         | Right ear          | - O.D. (right eye)           | Right ear |
| A.U.         | Both ears          | - O.U. (both eyes)           | Both ears |
| >            | Greater than       | - 7 (seven)                  | Greater than |
| <            | Less than          | - L (Left)                   | Less than |
| @            | at                 | - 2                          | at |
| L, R, Bil    | Left, Right, Bilateral | - unknown (illegible) | left or right or bilateral |

References 2, 8, 9
Risky Terms: Other Suggestions

Other dangerous terms may be found at the Institute for Safe Medication Practices (ISMP) website.

Try not to use any of the terms on the ISMP list.

Reference 2

ISMP website: http://www.ismp.org
Risky Terms:

Prohibited terms **cannot** be used on any type of written record. This includes:
- Any type of written order (handwritten or electronic)
- Progress notes
- Consultation reports
- Operative reports
- Surgical procedure lists
- Surgeon preference or procedure cards
- Specimen labeling
- Consent
- History and physical documentation
- Patient teaching materials/instructions

References 7, 8
Risky Terms: Exceptions

Remember: A trailing zero should not be used when writing out drug dosages.

However, the trailing zero is acceptable for:
- Lab values (i.e., test results)
- Equipment sizes
- Imaging studies (i.e. reports of lesion size)

Reference 7
Drag and drop terms from the word bank to complete the following chart.

<table>
<thead>
<tr>
<th>Terms that healthcare facilities must prohibit</th>
<th>Acceptable terms</th>
</tr>
</thead>
<tbody>
<tr>
<td>U</td>
<td>ml</td>
</tr>
<tr>
<td>MSO₄</td>
<td>mg</td>
</tr>
<tr>
<td>2.0</td>
<td>0.4</td>
</tr>
<tr>
<td>Q.D.</td>
<td>dl</td>
</tr>
</tbody>
</table>
You have completed the lesson on recommendations.

Remember:

- Drug terms prohibited by your facility should not be used.
- The Joint Commission prohibits the use of certain risky terms including all forms of:
  - U
  - IU
  - QD
  - QOD
  - MS
  - MSO4
  - MgSO4
  - Trailing zero
  - Lack of leading zero
References

<table>
<thead>
<tr>
<th>#</th>
<th>Term</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>acronym</td>
<td>abbreviation formed from the initial letters of a series of words</td>
</tr>
<tr>
<td></td>
<td>prohibit</td>
<td>forbid, veto, command against</td>
</tr>
<tr>
<td></td>
<td>risky</td>
<td>in the context of medication terminology: a medication term that could lead to a medication error</td>
</tr>
</tbody>
</table>
ASSESSMENT

1. With regard to the use of abbreviations in medical documentation, hospitals should:
   a. Eliminate use of all abbreviations
   b. Punish employees who use any abbreviations
   c. Place confusing abbreviations on a "risky list"
   d. Educate patients on the meaning of common abbreviations

   Correct: Place confusing abbreviations on a risky list
   Rationale: Hospitals should identify commonly used abbreviations. Confusing abbreviations should then be placed on a "risky list." Use of terms on the "risky list" should be prohibited.

2. The Joint Commission REQUIRES that healthcare facilities prohibit use of the term:
   a. U (for units)
   b. ug (for microgram)
   c. D/C (for discharge)
   d. T.I.W (for three times a week)

   Correct: U (for units)
   Rationale: Under Joint Commission guidelines, use of "U" (for units) MUST be prohibited. The other terms listed here can be risky as well.

3. Instead of using the term "c.c." (for cubic centimeters), the Joint Commission recommends using the safer term:
   a. ml
   b. mcg
   c. milligram
   d. microgram

   Correct: ml
   Rationale: Instead of using the risky term "c.c.," use the safer term "ml" (for milliliters).

4. Under Joint Commission guidelines, which of the following is considered a safe term?
   a. U
b.  I.U.
c.  Sub-Q
d.  Q.O.D

Correct: Sub-Q
Rationale: Of the terms listed, "Sub-Q" is considered acceptable. The others terms are all risky. These words should be spelled out in full.

5. Under Joint Commission guidelines, which of the following is the safest way to document, "one microgram"?
   a.  1 ug
   b.  1 mcg
   c.  1.0 mcg
   d.  1.0 microgram

Correct: 1 mcg
Rationale: Trailing zeroes must not be used. The term "mcg" is safer than the risky "ug."

6. Under Joint Commission guidelines, which of the following is an acceptable way to document, "one unit, taken once a day"?
   a.  1 U q.d.
   b.  1.0 U Q.D.
   c.  1 unit daily
   d.  1.0 unit daily

Correct: 1 unit daily
Rationale: Trailing zeroes must not be used. "Unit" must be spelled out. "Daily" must be spelled out.

7. Under Joint Commission guidelines, which of the following is an acceptable way to document, "one-tenth of a milligram"?
   a.  0.1 mg
   b.  .1 mg.
   c.  Either is acceptable

Correct: 0.1 mg
Rationale: Leading zeroes must be used.

8. As many as 5% of medication errors may be caused by the use of abbreviations.
   a. True
   b. False

Correct: True
Rationale: This is a true statement. As many as 5% of medication errors reported to a medical error reporting system were attributed to the use of abbreviations that were misinterpreted.