



**NIST NCPDP Analysis –  
SCRIPT Fill Status Message for Patient Medication Compliance  
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## A. Introduction

The goal of this document is to provide a high-level overview of the NCPDP SCRIPT Fill Status message (RXFILL), how it fits in to the medication management process, and current industry challenges.

### Document sections:

**Background.** Overview of pharmacy fill status reporting and how the NCPDP SCRIPT Fill Status message is designed to support it.

**Challenges Integrating Fill Status.** Workflow challenges faced by adopters.

**Open Issues.** Process and other issues related to use of the Fill Status message that the industry has yet to resolve.

**Barriers to Adoption.** Other challenges to adoption of the Fill Status message faces due to other industry considerations.

## B. Background

Patient medication compliance is a key element in determining clinical outcomes. Compliance data, when self-reported, is extremely useful for providers in adjusting treatment plans. However, self-reported data can be of questionable integrity. Coupling self-reported data with actual medication fill data from the dispensing pharmacy can enhance the quality of the compliance data available to the prescriber.

The purpose of the RXFILL message is to notify a prescriber the dispensing status of a prescription. It can be used for both new and refill prescriptions and will indicate if the prescription was filled, partially filled or not filled and the reason why.

The RXFILL transaction is included within the NCPDP SCRIPT Standard. According to the version 10.6 implementation guide:

The Prescription Fill Status Notification transaction is originated by the pharmacy. The transaction notifies the prescriber about the status of a prescription - either new or refill. The transaction can be used in three cases - to notify of a dispensed prescription (the patient picked up the medication), to notify of a partially dispensed prescription (patient picked up part of the medication), and to notify of a prescription never dispensed (patient did not pick up the medication).

*Dispensed* - in the context of the RXFILL message, means the medication is no longer in the possession of the pharmacy and has been handed, shipped, or delivered to the patient (or the patient's caregiver/representative). If the medication is still located in the pharmacy, it is not yet 'dispensed'.

*Returned to Stock (Not Dispensed)* – the procedure of the pharmacy when the patient does not pick up a medication that has already been processed and has been waiting for patient pickup when the medication is either returned to inventory or destroyed.

Use of the NCPDP SCRIPT RXFILL is voluntary for pharmacies and prescribers. Implementation and adoption will occur over time and there are still issues that the industry needs to resolve to achieve widespread use of the transaction.

To-date, the RXFILL message has only been implemented in the long-term and post-acute care settings, as part of an integrated medication supply process between a care facility and its institutional pharmacy. Fill Status messaging has had no material adoption in ambulatory settings.

### C. Challenges Integrating Fill Status

Since implementation of the Fill Status will occur over time and is not mandated, it is important for end users to realize that not all pharmacies and prescribers will be using RXFILL. As such, the data will not be complete and that must be considered in any assumptions being made.

Pharmacies may receive prescriptions in a variety of ways – paper, phone, fax and electronically – and can send an RXFILL message for any of these as long as the prescriber is part of the electronic network. If the original prescription was not received electronically, the pharmacy will not have an original transaction ID to include and therefore must provide enough patient and medication information to allow the prescriber’s system to match the message to the correct patient. The industry needs to come to consensus as to when RXFILL will be used if the prescription in question was not originally ordered electronically.

End users must note that more than one RXFILL message for a prescription can be sent. A “not dispensed” message may be sent today, followed by a “dispensed” message tomorrow. This is clearly driven by the timing of the messages and the actions of the patient. Each message should be considered as a snapshot of a moment in time. A “not dispensed” message is generally triggered when a pharmacy returns a prescription to stock; some pharmacies may hold prescriptions up to 14 days. Yet if the patient shows up the next day, a “dispensed” message may be sent. Both the pharmacy and prescriber systems need to be able to support these messages and manage them accordingly. For acute medications, other methods may be needed to determine if a patient has picked up their medication.

Prescribers, and their systems, must realize that they will receive RXFILL messages only for a portion of the prescriptions written by the prescriber. No assumptions should be made about prescription status or patient compliance based on the availability of RXFILL messages.

### D. Open Issues

Currently, it is not expected that an RXFILL message will be sent when a prescription is transferred from one pharmacy to another. As an example, a patient may initially fill the prescription at Pharmacy A and an RXFILL message is sent to the prescriber. The patient then goes to Pharmacy B and requests that the prescription be transferred and filled there. Related questions being addressed by the industry are:

- Who is responsible for notifying the prescriber that the prescription has been transferred? Pharmacy A or Pharmacy B? Is a reason for transfer needed? Is it necessary to identify Pharmacy B?
- Pharmacy B would need to know to send an RXFILL message to the prescriber, assuming they have this capability.

- The prescribing system would need a way to link the RXFILL messages from two different pharmacies.

Another current consideration is whether it is beneficial for fill information to be returned for every prescription and fill, or only in cases where the interest and value is greater. The industry is working to modify the NewRX transaction so that the prescriber can indicate if they wish to receive RXFILL messages. Doing so will streamline the process by allowing the prescriber to request or opt not to receive an RXFILL message at the time they send the new prescription.

### **E. Barriers to Adoption**

As with any new transaction, there are some general issues that arise within the industry. Limited resources are available to program and test new transactions. The benefits of any new transaction must be identified and quantified to assist in determining the return on any investments made in implementation.

When considering RXFILL, there are additional challenges to implementation that can be tied to timing and competing priorities for pharmacies and prescribers alike. Pharmacies are currently facing implementations of transactions to support HIPAA 2 (namely claims and eligibility). They are awaiting final rules from the federal government as to the electronic prescribing of controlled substances and a new version of the SCRIPT standard for electronic prescribing. Prescribers are primarily focused on electronic prescribing and meaningful use in order to maximize the incentive funds that are available. Prescribers are also facing system changes to support HIPAA 2 and the implementation of ICD-10 codes.

All of these looming requirements, plus any other state or practice initiatives, are likely to take precedence over the implementation of transactions such as RXFILL. Pharmacies and prescribers will need to be certified to send/receive the RXFILL transaction. This creates yet another step in the implementation process, potentially with additional fees, that needs to be completed before use of the RXFILL transaction can occur.

Prescribers will need to determine the value of the RXFILL transaction as compared to the Medication History transaction, which can provide some of the same information. Eventually, RXFILL can be sent automatically whereas a request for medication history must be sent. They may choose to use RXFILL for patients where there are more concerns about compliance so as to get more timely information. RXFILL can be sent for prescriptions where the patient paid cash; these are not always included in the medication history transaction.