

Medication Reconciliation Persona Scenarios

The Ring of FHIR test environment includes the Personas, these are richly detailed patients, providers, and organizations. Personas represent a broad group of stakeholders including professionals, retirees, parents, children, people in good health and those with complex conditions, all of which can be used to track and test multiple aspects of any use case.

Personas feature the following characteristics:

- Fully developed narratives with unique attitudes, behaviors, beliefs, and service needs based on ethnographical research and interviews
- Expanded scope of roles including but not limited to: patients, primary care providers, specialists, provider organizations, payers, service organizations, etc.
- Longitudinal medical history and storyline for each persona that is static over time and persistent across use cases
- Persona data comprehensively integrated into Health Information Networks, state systems, and participating organization test environments

The following Personas are all patients that benefit from the process of Medication Reconciliation. “Medication reconciliation” is the detailed process of checking the accuracy of a patient’s medications, particularly when those medications have changed. Finding and correcting medication discrepancies helps avoid errors such as omissions, duplications, dosing errors or negative drug interactions. Regular confirmation of a patient’s medications can also help confirm the patient is correctly following a treatment plan.

Millie Bryant



Millie Bryant’s journey began with problems around obesity, which led to diabetes mellitus type 2 with peripheral neuropathy and increasing issues with mobility, especially with her hips and knees. Now 72 years old, Millie is battling an increasing number of health problems, her son has medical power of attorney but everything regarding her healthcare still feels hard.

Recently, Millie was admitted to the local emergency room with chest pains. Following the onset of atrial fibrillation, Millie was admitted to the Emergency Department due to a heart attack.

George Tullison



George Tullison suffers from Type 2 Diabetes brought about because of obesity. He also has hypertension, Hepatitis C, and a history of alcohol abuse. Recently, George lost his job, which has put his healthcare, home, and life at risk.

George recently had an inpatient visit and was diagnosed with congestive heart failure. Since the diagnosis George has frequently landed in the hospital or ER with complications from his congestive heart failure, diabetes, hepatitis C and hypertension. George's complex care needs make him a high risk for re-hospitalization after discharge.

Sarah Thompson



Sarah Thompson suffered a back injury while working, and was prescribed Oxycodone for pain. In hindsight, if she knew where it would lead, she would have never taken the drug.

Sarah quickly became addicted to the drug, but because she had no health insurance through work, she could no longer afford it. A co-worker offered her heroin as an affordable alternative. Sarah said no at first, but the pain persisted and before she knew it she was addicted.

Sarah was charged with DUI and possession of a Level 1 controlled substance after being pulled over by the police while speeding down the interstate. She was given the choice of "getting clean" or going to jail. Sarah spends time in and out of methadone clinics before maintaining her sobriety. Recently, Sarah visits her PCP but doesn't share her history of narcotic dependence for using IV heroin.

Christy Munson



Christy Munson has never been the kind of person to give her health a second thought. She is now 38 and has seen her weight rises and lowers each year. In the last year, Christy's weight increased more than usual and for the first time began to impact her emotional well-being as well.

Then other problems began to emerge. She complained to her doctor about fatigue as well as pain in her lower back and hips. After a multitude of tests, Christy felt no better and her doctor was no closer to providing her with a diagnosis or reason for the pain. Christy's doctor even noted at one point that her symptoms could possibly be a manifestation of depression or psychosomatic in nature. This idea really angered Christy.

Christy's pain only seemed to increase. She changed doctors (after the psychosomatic comment) and began to see specialists, most focused on pain. After another round of blood draws and scans, Christy and her specialists could not pinpoint the problem either.

Christy had a recent flare up and her intolerable pain resulted in a visit to the ER where they prescribed her a 30-day opioid prescription.

Alex Gonzales



After a motorcycle accident left him disabled, Alex Gonzales and his family have gone through some dark times. Alex has always been a private and proud individual and his new life has challenged that attitude. This event has pulled Alex into clinical depression as he struggles to make ends meet.

Alex continues to struggle with chronic back pain and hypertension in addition to his depression. After losing his job, Alex has begun working with a care coordinator decides to move to a new city. When he moved Alex

decided to initiate care with a new PCP and wanted to keep his medical care and behavioral health care separate. The previous PCP has records of behavioral health medications because they prescribed them, but his new PCP does not have any record of his behavioral health diagnosis or medication.

Santiago Morales



Santiago Morales has always had a passion for adventure. Now at 76, when he looks back he sees a life that was lived to the fullest. Being a senior citizen is a new kind of an adventure and one Santiago wasn't expecting. He is dealing with multiple comorbid conditions and there always seems to be something new to challenge his health.

Santiago sometimes has a hard time remembering all of his conditions. To keep up his sense of humor he has made it up into a little song ("Hypertension, Hypercholesteremia, Type 2 Diabetes, Congestive Heart Failure, Hip Arthritis, COPD and Asthma") that he has been known to sing to his doctors.

He has yet to find a way to do this with his current 13 different medications though. Santiago would be interested in any options that would make managing his medication, care team, and health conditions easier. After not feeling well for several days, Santiago visited his PCP and found out he has a mild viral infection to add to the list.

Hackathon Activity

Each of the Personas included above represent a Medication Reconciliation scenario that needs to be performed. Participants should identify the issue with each Persona and propose a solution(s) for Medication Reconciliation leveraging the available FHIR resources. We encourage participants to leverage all the Personas included above and identify which of the following scenario(s) they match with:

- ☐ Duplication of same medication
- ☐ Duplication of generic and brand name medication
- ☐ Missing medications
- ☐ Negative Drug Interaction
- ☐ Conflicting medication records
- ☐ Complex medication management