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DATA SHEET

How can Micromedex support patient safety around polypharmacy in older populations?

When a person is taking multiple medications, this is known as polypharmacy. Careful consideration is required when making clinical decisions around medications for vulnerable patients with multiple complex conditions.

If polypharmacy rates increase in line with the current expectations, it is highly likely that more elderly people will be at risk of avoidable harm in the future.

To put this into perspective, a person who takes more than ten medications is 300 percent more likely to be admitted to hospital because of an adverse drug reaction (ADR).[3]

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In England alone, more than one third of people aged 80 or older regularly take eight or more medications[1], a total that is only expected to grow as the population ages.

67%

In the US, 67 percent of elderly Americans take more than five medications (including over the counter drugs and supplements) that could interfere with` prescribed drugs.[2]

3 ways Micromedex can help

Micromedex is an evidence-based clinical reference tool that supports patient safety around` avoidable harm. There are many ways that Micromedex can help healthcare professionals to reduce the risks of polypharmacy in older populations, but we have put together a list of 3 to get you started.

1. Avoiding adverse interactions

A person taking two medications has a 13% risk of experiencing an ADR; this risk increases to 58% and 82% when taking five and seven or more medications per day, respectively[4]

The more medications a patient is taking, the more the risk of adverse drug events increases[5]. As well as drug-drug interactions, other types of interactions must also be considered, for example drug-food interactions.

The Micromedex Drug Interactions checker can support healthcare professionals as they carry out structured medication reviews with elderly patients on multiple medications, identifying interactions for drug-drug, drug-food, drug-ethanol, drug-laboratory, drug-tobacco, drug-herbal, drug-pregnancy, drug-lactation and allergy screening.

For example, an elderly patient on Triazolam for insomnia who is also taking Clopidogrel to reduce the risk for blood clots, as well as multiple other medications for their chronic condition, should be warned by their clinician that grapefruit may result in reduced exposure of Clopidogrel.

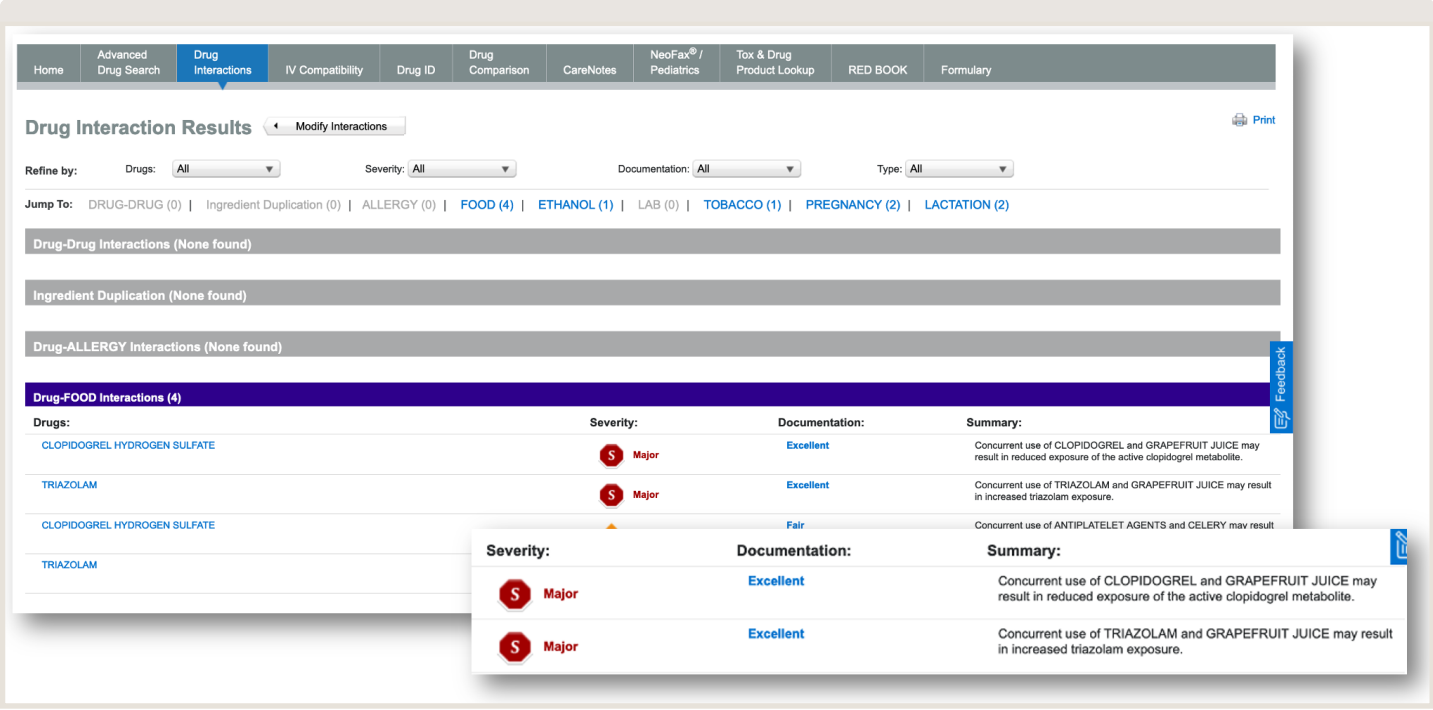

Figure 1: Micromedex Drug Interactions results for Triazolam and Clopidogrel

2. Fully referenced deprescribing considerations

There are times that healthcare providers need to improve patient outcomes by managing drug regimens accordingly in order to support patient safety, and this can include deprescribing.

Micromedex Drug Consults offer fully referenced, evidence-based articles that cover a wide range of topics on drug therapies and treatment guidelines

For example, overprescribing to frail or elderly patients can increase the risk of hypoglycemia[6], potentially resulting in hospitalizations and emergency room visits. It also contributes to polypharmacy, which can increase the risk of adverse drug reactions, decrease compliance with medications, and impact quality of life.

The Micromedex Drug Consult on Deprescribing Benzodiazepine Receptor Agonists for Insomnia can be accessed for quick reference to considerations on deprescribing for adults, including elderly adults living in the community or in long-term care facilities. Includes guidance on risks for benzodiazepine agonist use, deprescribing recommendations and algorithm, and alternative cognitive and behavioral therapy.

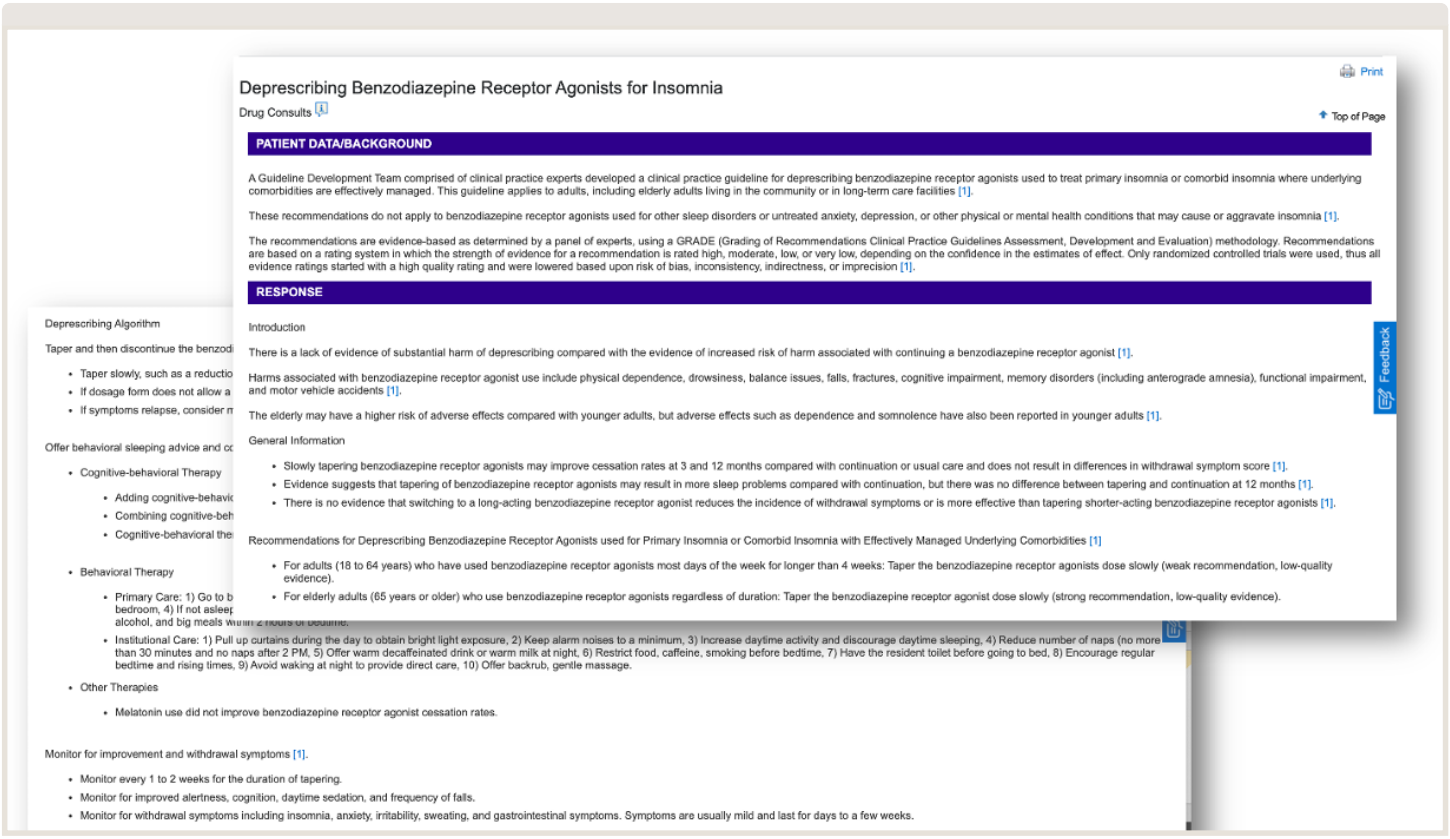

Figure 2: Sections from the Micromedex Drug Consult on Deprescribing Benzodiazepine Receptor Agonists for Insomnia

3. Quick access to tools to support safe medication use in elderly populations

Clear warning systems that alert clinicians to potential dangers are incredibly valuable, particularly from the perspective of reducing avoidable harm. Micromedex includes a variety of useful tools to support patient safety when treating elderly populations, including Drug Consults on the Beers Criteria for potentially inappropriate medication use in older adults, and the STOPP/START criteria for the appropriate use of medications in elderly patients to support guidance around reducing problematic polypharmacy and avoiding unnecessary or inappropriate medicines.

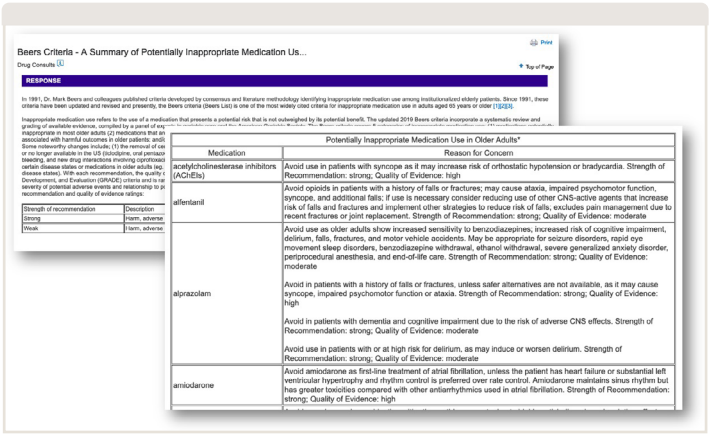

Figure 3: Sections from the Micromedex Drug Consult on Beers Criteria

When treating elderly patients who may receive medication through a feeding tube, it's important to understand which medications should not be crushed, because the dosage and absorption rate of certain drugs can change dramatically when they are ground into food.

Micromedex incorporates a Drug Consult Do Not Crush List, sourced from the medication manufacturer's prescribing information, to serve as a quick reference guide to clinicians, to support their decisions and best judgment based on an individual patient's medical need.

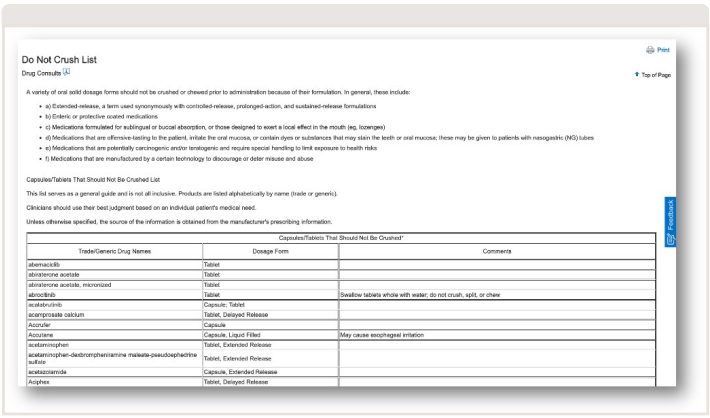

Figure 4: A view of the Micromedex Drug Consult Do Not Crush List

Micromedex also provides a Drug Consult on Enteral Feeding Tubes and Medication Delivery to support patient safety for those who may not be able to swallow safely. It provides information on tube characteristics, general recommendations, dosage form considerations and more.

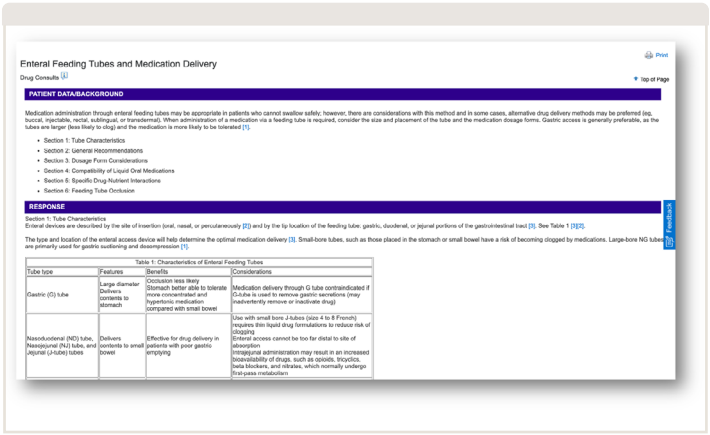

Figure 5: Section from the Micromedex Drug Consult on Enteral Feeding Tubes and Medication Delivery

To find out more on how Micromedex supports patient safety around polypharmacy visit the website, or request a trial access.

About Micromedex

Micromedex by Merative is trusted by healthcare professionals across 70 countries to provide award-winning clinical decision support solutions for drug and disease information and patient education. Micromedex was named Best in KLAS 2023 (clinical decision support: point of care clinical reference), is recognized as a CMS compendium, and is accredited by NICE for its robust editorial process.

Learn more at
merative.com/clinical-decision-support

About Merative

Merative is a data, analytics and technology partner for the health industry, including providers, payers, life sciences companies and governments. With trusted technology and human expertise, Merative works with clients to drive real progress. Merative helps clients reassemble information and insights around the people they serve to improve healthcare delivery, decision making and performance. Merative, formerly IBM Watson Health, became a new standalone company as part of Francisco Partners in 2022.

Learn more at merative.com

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