





Use Case 1	<p>Replacing a nutrition bag from an intravenous drip – procedure manual</p> 
Actor	Medical caregiver (thuiszorg/homecare)
Basic Flow; install nutrition bag from an intravenous drip	Every Thursday a medical caregiver visits a patient that has a PICC line inside one of their veins installed to an intravenous drip. The caregiver needs to install new sacks and replace the bandages that keep the PICC line neatly in place. This requires a lot of actions which the caregiver needs to approach in a specific order. The caregiver uses Text to Speech and Voice Control to read out instructions and/or uses AR to visually show the instructions.
Description	This scenario describes the situation in which the caregiver uses the Text to Speech/Voice Control tool. This is the main success scenario.
1	The caregiver says “Zenya. Replace nutrition bag from intravenous drip”
2	Their phone confirms that the right document is found by saying: “Replace nutrition bag from intravenous drip. One procedure manual document has been found and opened for usage.”
3	The caregiver says “Read/Start procedure”
4	The phone keeps telling each step and after finishing each step the caregiver says “Next”
5	The caregiver has installed the nutrition bag

Alternative Flow 1A: setup settings and equipment	The caregiver must first setup the settings and equipment correctly in order to be able to use Text to Speech, Voice Control and AR.
Description	This scenario describes the situation in which the caregiver must first setup their settings and equipment.
1B1	The caregiver opens the app
1B2	The caregiver gets to see a setup
1B3	The caregiver gives permission for using the camera and microphone
1B4	<p>The caregiver installs their phone/microphone, puts on AR glasses/a headset/earbuds and connects them</p> 
Termination outcome	The caregiver has setup the things that are mandatory for using the app

Alternative Flow 3A: install nutrition bag from an intravenous drip with AR	The caregiver needs visual instructions in order to replace the nutrition bag correctly
Description	This scenario describes the situation in which the caregiver uses the AR tool. This is the main success scenario for using this technology.
3A1	Their phone confirms that the right document is found by saying: "Replace nutrition bag from intravenous drip. One procedure manual document has been found and opened for usage. AR option available"
3A2	The caregiver says "Read/Start procedure with AR"
3A3	<p>The caregiver puts/makes sure they have their AR glasses/phone holder headset/microphone headset/earbuds on/in</p> 
3A4	<p>The phone keeps telling each step and after finishing each step the caregiver says "Next" until the step where AR is supported is ready to be executed. The caregiver sees visual instructions displayed in steps.</p> 
Termination outcome	The caregiver has installed the nutrition bag with help from AR

Post conditions

- Devices and Voice Control should be turned off after the caregiver is done with their tasks in order to save battery life

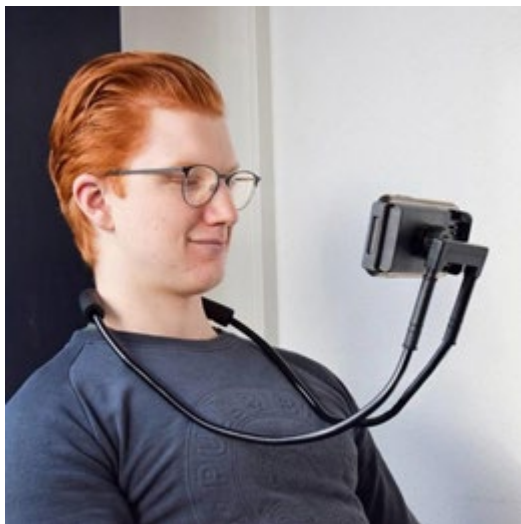
Rules

- Voice Control and other devices that send/receive data should be turned off immediately after the caregiver is done with their tasks in order to protect privacy better
<https://www.vpngids.nl/privacy/devices/privacyrisicos-smartglasses/>

Threats

Threat	Solution
Patients or other people in the room are talking/making noise when the caregiver is trying to use a voice command	<ul style="list-style-type: none">Caregiver wears a microphone (headset)Caregiver wears earbuds (with built-in microphone)
Patients or other people accidentally trigger a voice command.	<ul style="list-style-type: none">Personal voice recognitionMake a voice command that disables Zenya or the phone from listening until a certain command triggers the phone/app to listen again.
Caregiver forgets voice commands	<ul style="list-style-type: none">Personal voice recognitionMake a voice command that disables Zenya or the phone from listening until a certain command triggers the phone/app to listen again.
Caregiver mispronounces words	<ul style="list-style-type: none">Make a voice command that cancels the most recent command
The app needs camera and microphone permissions	<ul style="list-style-type: none">Give users the option to give permissions on the setup screen when it's the first time they open the app

Some wearables that might help increase UX and/or workflow of caregivers





Method

<https://www.usability.gov/how-to-and-tools/methods/use-cases.html>