9.5 Add or Remove Samples in Single Access Mode

With this function it is possible to add or remove samples from the cassette. All actions with the **Add** or the **Remove** button apply to the **Operator Access Position**.

1 The laboratory supervisor is responsible for adding/removing samples. Never add or remove samples without the permission of the laboratory supervisor.

	Info	Add	Remove	Settings
--	------	-----	--------	----------

Figure 9.9 Main Menu Touch Screen Buttons

9.5.1 Adding Samples

- 1. Press the **Add** button.
- The Add selection window appears displaying 3 buttons: When no empty position is left, the Go to free button is disabled and grayed.

dd	Back (25s)
In sequen	ce from position
Got	o position
G	o to free

Figure 9.10 The Add Selection Window

- 2. Press the **Go To Position** button to choose the sample position.
- The Position selection screen appears:



Figure 9.11 Position Selection Screen

- 3. Select an empty gray position to insert the sample into (white positions are loaded with samples).
- The conveyor chain rotates the selected position to the Operator Access Position, during which a message is displayed on the screen:





• When the operator access position is reached the following message is displayed:



Figure 9.13 Insert Sample Screen

4. Insert the sample into the Operator Access Position (Figure 9.14/1).



Figure 9.14 Operator Access Position

- **1** Note: Make sure the sample height is within the limits set in "Sample Adjustment and Maximum Sample Height" on page 60.
 - The selection screen (Figure 9.11) will be displayed again:

- 5. To finish this function,
 - ▶ press the Back button,
 - or
 - To add another sample,
 - press a gray position,
 - or
 - To replace a sample,
 - ▶ press a white position. The following message is displayed:

Add Samples		Back (2s)
	Now replace the sar Access Position wit	
	Operator Access Position:	39
Skip position	Tube ID:	

Figure 9.15 Replacing a Sample

9.5.1.1 Adding Samples - Go to Free Position

When samples do not need to be in any specific order, it is faster to add a sample in the nearest free position:

1. Press the Add button in the main screen.



Figure 9.16 Add/Remove Button

The Add selection screen is displayed:





- 2. Press the Go to free button.
- The chain rotates to the next free position:

Add Samples			Back
	Please wait for a fre	e positi	ion
	Operator Access Position:	3	9
Skip position	Tube ID:		

Figure 9.18 Waiting for a free position

3. Insert a new sample, or press the **Skip position** button to continue to the next available position:





 When a sample has been inserted, the chain rotates automatically to the next free position.

Exception: When the chain has been completely filled, an information screen is displayed:



Figure 9.20 Display: No more free positions

4. When all samples have been inserted, press the **Back** button to return to the main menu.

9.5.1.2 Adding/Replacing Samples in Sequence

This functions allows samples to be added or replaced sequentially in ascending order, until the **Back** button is pressed.



Figure 9.21 Removing Samples in Sequence from Position

- 1. Press the Add button (Figure 9.16) in the main screen.
- The Add selection screen is displayed.
- 2. Press the In sequence from position button.
- The Position selection screen appears.
- 3. Select an empty gray position for adding a sample or a filled position for replacing.
- 4. Add the sample to the position selected.
- The chain rotates in ascending order to the next position, whereas another sample can be added or replaced.

Use the **Skip Sample** button to skip a sample. Use the **Back** button to return to the main menu.

Operation

9.5.2 Removing Samples

1. Press the **Remove** button (Figure 9.16) in the main screen.



The Remove selection screen is displayed:

Remove	Back (27s
In sequence from position	Cassette
Measured All	Go to position

Figure 9.22 Remove Selection Screen

- 2. Press the Go to position button to choose the sample position.
- The Position selection screen appears:





- 3. Select a white (loaded) position for removing (gray positions are empty positions).
- While the conveyor chain rotates the selected position to the Operator Access Position, a message is displayed on the screen:

Remove Sample	es	Back
	Going to position 58	
	Operator Access Position:	1
Skip position	Tube ID:	

Figure 9.24 Going to Position



0322

Position:

Tube ID:

When the sample arrives at the Operator Access Position the following message is displayed:

Figure 9.25 Remove Sample Screen

4. Remove the sample from the **Operator Access Position**.

Skip position Sample Available



Figure 9.26 Operator Access Position

- The selection screen (Figure 9.11) will be displayed again.
- 5. To finish this function:
 - Press the Back button,
 - or

To remove another sample,

▶ Press a white position.

9.5.2.1 Removing All the Samples

To remove all the samples individually through the Operator Access Position.

- 1. Press the **Remove** button (Figure 9.16) in the main screen.
- The Remove selection screen is displayed.



Figure 9.27 Remove All

- 2. Press the All button.
- The chain rotates to the next position filled with a sample and a message is displayed:

Remove Samples	s	Back (21s)
	Now remove the sam Operator Access Pos	
	Operator Access Position:	37
Skip position Sample Available	Tube ID: 03	322

Figure 9.28 Removing the sample

- 3. Remove the sample.
- The chain rotates to the next position filled with a sample.

This procedure will be repeated, until all samples are removed from the cassette. To skip a sample, press the **Skip position** button.

When all samples have been removed, a message is displayed that no more samples are in the cassette (apart from any skipped samples):

Remove Samples	:	Back (28s)
	No more measured samp cassette.	les in the
	Operator Access Position:	4
Skip sample	Tube ID:	

Figure 9.29 No more samples in the cassette

4. Press the **Back** button to return to the main menu.

9.5.2.2 Remove Measured Samples from the Cassette

It is possible to remove just the measured samples from the cassette. The measured sample positions are green colored, their state is **Finished**.



Figure 9.30 Finished Samples

To remove all measured samples individually through the Operator Access Position:

- 1. Press the **Remove** button (Figure 9.16) in the main screen.
- When measured samples exist, the Measured button is enabled.
- 2. Press the **Measured** button.

Remove	Back (25s)
In sequence from position	Cassette
Measured	Go to position

Figure 9.31 Remove Measured

• The chain rotates the nearest measured sample to the **Operator Access position**.



Figure 9.32 Removing Measured

When the measured sample arrives in the **Operator Access Position**, a message is displayed:

Remove Sample	S	Back (21s)
	Now remove the sa Operator Access Pe	
	Operator Access Position:	37
Skip position	Tube ID:	322
Sample Available		

Figure 9.33 Removing finished samples

- 3. Remove the sample.
- The chain rotates to the next position filled with a measured sample.

This procedure will be repeated, until all measured samples are removed from the cassette. To skip a measured sample, press the **Skip Sample** button.

When all finished samples have been removed, a message is displayed that no more finished samples are in the cassette (apart from any skipped samples):

Remove Samples	:	Back (28s)
	No more measured s cassette.	amples in the
\checkmark	Operator Access Position:	4
Skip sample	Tube ID:	

Figure 9.34 No more measured samples in the cassette

4. Press the **Back** button to return to the main menu.

9.5.2.3 Removing Samples in Sequence

This functions allows the removal of samples sequentially in ascending order from a selected position, until the next empty position is reached.

temove	Back (27
In sequence from position	Cassette
Measured All	Go to position

Figure 9.35 Removing Samples in Sequence from Position

- 1. Press the **Remove** button (Figure 9.16) in the main screen.
- The Remove selection screen is displayed.
- 2. Press the In sequence from position button.
- The Position selection screen appears.
- 3. Select a white (loaded) position for removing (gray positions are empty positions).

Use the **Skip Sample** button to skip a sample. Use the **Back** button to return to the main menu. See also the figures in chapter "Removing Samples" on page 74.