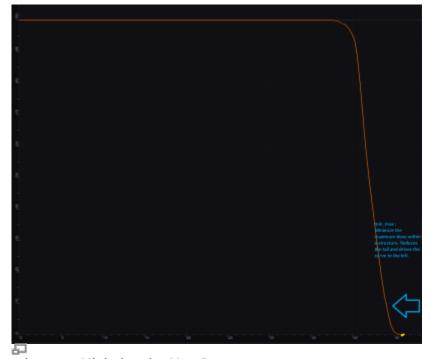
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Objectives

Objectives communicate to the optimizer the goals that are important to strive for in your plan. Objectives are set at the Plan level under Plan Constraints/Objectives and they apply to the total, combined dose from all beams. Objectives are not given relative importance at this point and can they can be added in order you desire within impacting the results as the Objectives drive the solution of the Multi Criteria Optimization (MCO). It should also be noted that for each objective a corresponding Navigation Slider will be presented to allow for exploration of trade-offs in the case of competing objectives (for more information about the MCO process and how objective importance/weighting is handled in Astroid refer to this article.

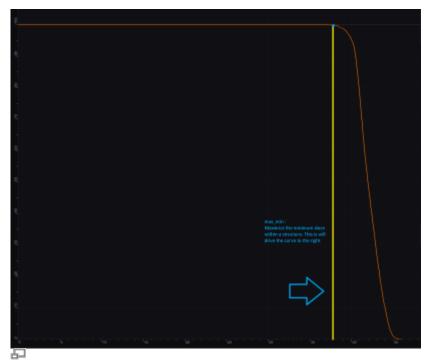
The following objective selections are available in Astroid:

- min max: Minimize the maximum dose within a structure
- max min: Maximize the minimum dose within a structure



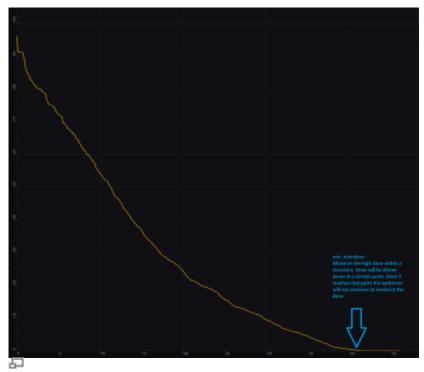
min_max: Minimize the Max Dose

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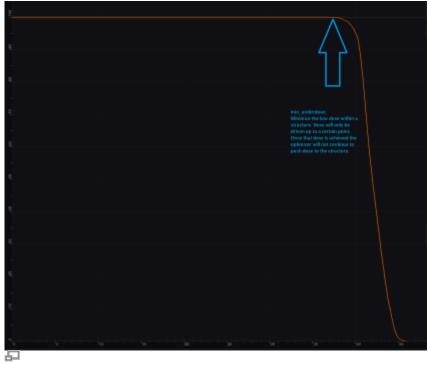
max_min: Maximize the Min Dose

- min mean: Minimize the mean dose within a structure
- max_mean: Maximize the mean dose across the structure
- min overdose: Minimize the high dose within a structure
 - Dose will only be driven down to the specified limit (this is often more relevant that min_max, since it may not be beneficial to continue minimizing beyond a certain dose level)
- min_underdose: Minimize the low dose within a structure
 - Dose will only be driven up to the specified limit (this is often more relevant that max_min, since it may not be beneficial to continue maximizing beyond a certain dose level)



min_overdose: Minimize the high dose

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min_underdose: Minimize the low dose

Working with Objectives

- 1. Open the Objectives sub-block contained in the Plan Constraints/Objectives block
- 2. Choose the structures to apply objectives
- 3. Check the boxes for the objectives to apply to the structure and set the dose level if applicable



Once all the Objectives have been set the user can move to Navigation block to start the MCO.

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