

## عنوان مقاله:

Evaluation of the effect of granulation processing parameters on the granule properties: Lactose-Cornstarch case study

## محل انتشار:

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## خلاصه مقاله:

Understanding the relationship between processing parameters of fluidized bed wet granulation and the characteristics of intermediate and final products is crucial in the pharmaceutical processes. This research examined a fluidized bed wet granulation process containing a cornstarch solution as binder and lactose particles as powder. The design of experiment (DoE) was performed according to an L9 Taguchi method with three replications. The variables considered in the experimental design were binder flow rate, drying air temperature, spraying pressure, and initial mass of particle. The physical properties of the granules were evaluated in terms of granule mean size and granule size uniformity. A predictive model for each individual response was proposed. In addition, optimum conditions for each response were also obtained. Finally, the effect of the granule mean size on the flowability of granules was also investigated.

## کلمات کلیدی:

,Fluidized Bed Granulation, Taguchi Method, Granule Mean Size, Size Distribution, Flowability

## لینک ثابت مقاله در پایگاه سیویلیکا:

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