

Sodium Hyaluronate (The Better Chromaticity)

E-Newsletter-September.2021

Kangcare Bioindustry Co.,Ltd.

Sodium hyaluronate is our core product, low chroma is one of its characteristics and advantages.

Specification:

Sodium hyaluronate, Cosmetic grade;



Specification features introduction:

This specification product through Kangcare's unique production process improvement method, remove more impurities, so as to get a more pure, white sodium hyaluronate, and the configuration of aqueous solution clear transparent.

Specification Background:

Sodium hyaluronate is not only used as moisturizing agent for cosmetics, but also used as pharmaceutical products for ophthalmology, orthopedics and dermatology. It can from animal tissue, for example, can from chicken cockscomb, bull 's-eye vitreous extract manufacturing and, but because of chondroitin sulfate, etc as impurity interfuse, or because hyaluronidase is contained within the organization, makes it easy to low molecular quantitative, therefore developed to microorganisms with sodium hyaluronate production capacity for training, method for producing sodium hyaluronate from culture medium (fermentation process).



There are some impurities such as protein or heat source in the sodium hyaluronate produced by extraction or fermentation, so the methods of separating and removing impurities to get high purity sodium hyaluronate products are studied. In particular, the removal of impurities in the initial stage of manufacturing can reduce the burden of subsequent purification processes, which is expected to develop a method of high purity products that can be used as pharmaceutical products. As an example, there are corresponding research methods that have been disclosed.

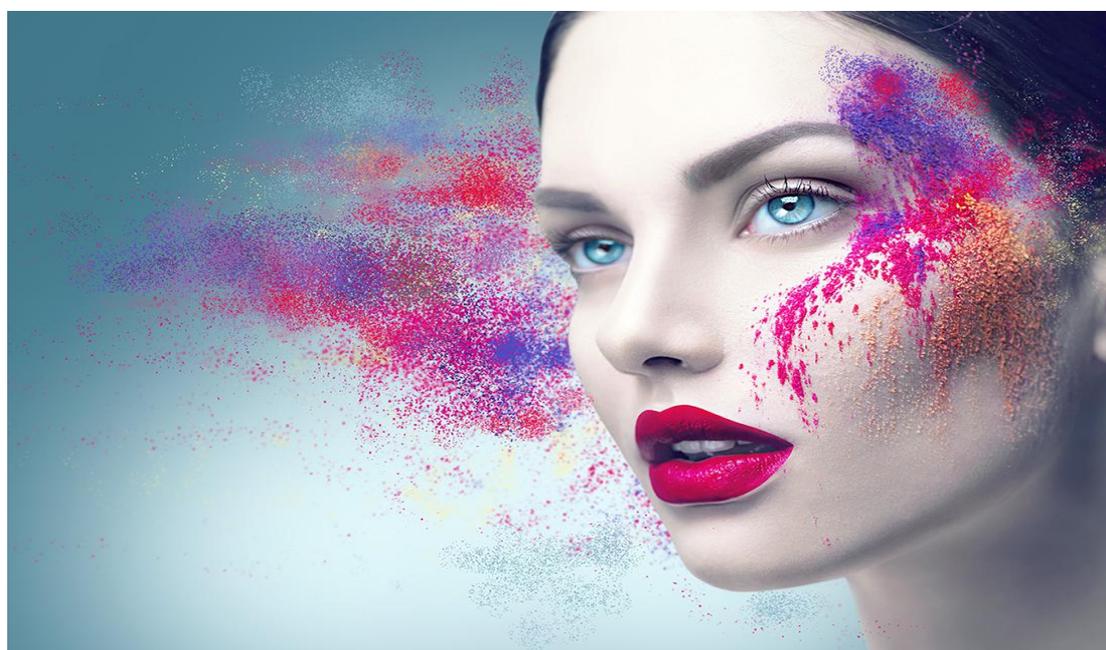


No matter what method is used, the purpose is to remove impurities such as protein, nucleic acid and cell wall residue in the fermentation liquid, and improve the purity and production efficiency of sodium hyaluronate. The existing technology is not obvious in removing impurities, and the

clarity of sodium hyaluronate solution obtained is very unstable, the transparency of aqueous solution is inconsistent, and it will turn yellow or turbid. The unique technology developed by Kangcare is mainly to optimize the extraction process of sodium hyaluronate fermentation liquid and improve its color and purity by adjusting the amount of dissolved water and ethanol and adjusting the appropriate PH.

Technical Description:

In the process of fermentation liquid purification, the volume of dissolved water is increased, the pH is adjusted to dissolve and take away more impurities, and activated carbon is added to adsorb for decolorization and impurity removal. The activated carbon can be removed after filtration twice, and then the amount of ethanol is increased for post-precipitation, and the number of ethanol elution is increased, and the hyaluronic acid powder is obtained by centrifugal drying.



Beneficial effects:

The improved production process can remove more impurities, produce more pure sodium hyaluronate, whiter color, and the aqueous solution is clear and transparent. The purity is as high as 97.5%, the purity of glucuronic acid is above 47%, the chroma is less than 1.0, and the protein content is less than 0.04%.

**Kangcare's price has the advantage,
quality at the same time has
guaranteed, welcome to consult!**

透明质酸钠（低色度）

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Kangcare Bioindustry Co.,Ltd.

透明质酸钠是我司的核心产品，低色度是其特色与优势规格之一。

规格信息：

透明质酸钠 化妆品级：



规格特色简介：

本规格产品通过我司特有的生产工艺改进办法，去除更多的杂质，从而得出更纯净，色泽更白的透明质酸钠，且配置的水溶液澄清透明。

规格背景：

透明质酸钠，除了作为化妆品的保湿剂以外，还用作眼科、骨科、皮肤科等的药剂制品。它可以从动物组织，例如，可以从鸡的鸡冠、牛眼玻璃体等的提取物制造而得，但因为作为杂质的硫酸软骨素等的混入，或因组织内含有透明质酸酶等使其容易被低分子量化，因此发展出了将具有透明质酸钠生产能力的微生物进行培养，从培养液中制造透明质酸钠的方法（发酵法）。



使用提取法或发酵法制造得到的透明质酸钠中，存在蛋白质或致热源等杂质，因而人们对分离去除杂质得到高纯度透明质酸钠制品的方法进行了研究。特别是制造的初期阶段中的杂质的去除，能够减轻之后的提纯工序的负荷，有望开发出能够作为药剂制品使用的高纯度制品的方法。作为这样的例子，也有相应得公开过的研究方法。

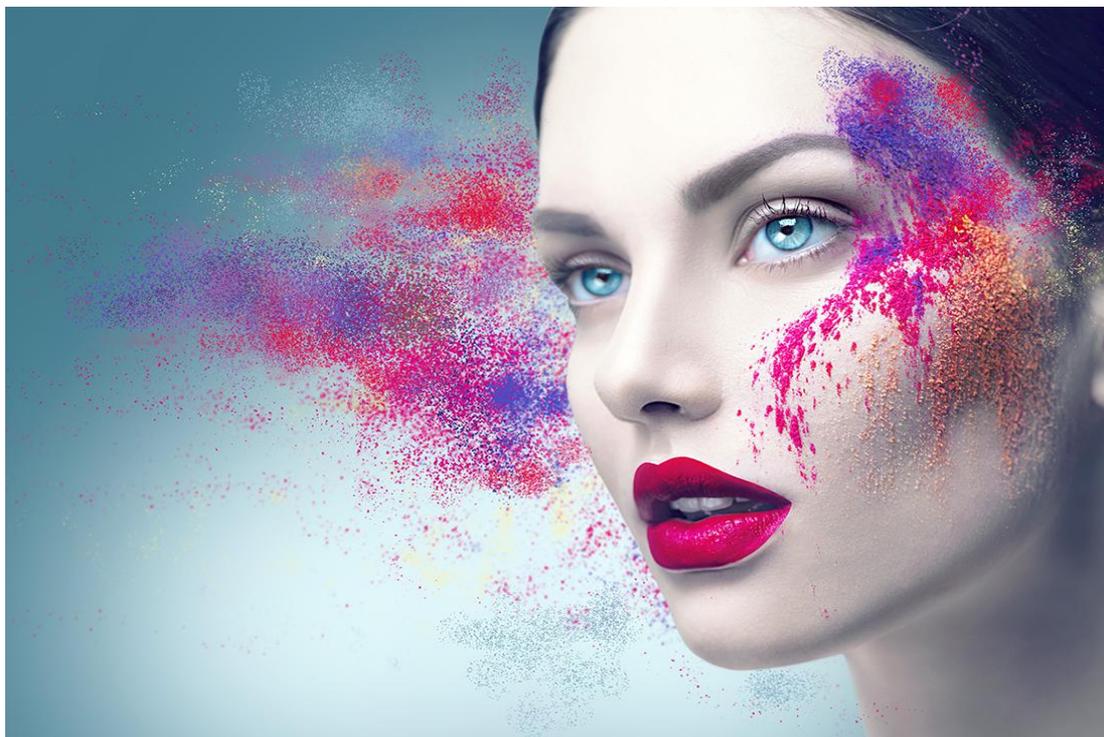


无论使用何种方法，其目的都是去除发酵液中的蛋白、核酸、细胞壁残留等杂质，提高透明质酸的纯度和生产效率。现有的技术除杂效果不明显，得到的透明质酸钠溶液澄清度非常不稳定，水溶液透明度不一致，会变黄或者浑浊。我司研究出的此特有的技术主要是通过调整溶解用水和乙醇用量、调节合适的 PH 等方法，优化透明质酸钠发酵液的提取工艺，提高其

色度和纯度。

技术内容说明：

本技术在发酵液纯化的过程中增加溶解用水的体积、调节 pH 进行溶解带走更多杂质，并加活性炭吸附进行脱色除杂。得到的粗品进行两次过滤后可以去除活性炭，再增加乙醇用量进行后沉淀，并增加乙醇洗脱次数，离心干燥得到透明质酸粉末。



有益效果：

改进后的此生产工艺，可以去除更多的杂质，生产出的透明质酸钠更纯净，色泽更白，且配置的水溶液澄清透明。纯度高达 97.5%，葡萄糖醛酸纯度在 47% 以上，色度 1.0 以下，蛋白含量低于 0.04%。

我司的价格具有优势，品质
同时具有保证!