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INK REMOVER

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2 Claims. (Cl. 87-5)

The present invention relates to an ink removing composition and more particularly to a cream for the removal of ink stains especially from the hand or skin of the user of ink.

5 It is well known that heretofore various kinds of ink removers have been proposed. Generally speaking, it has been the practice to utilize a particular remover for a single ink stain. Thus, for instance, soaps and other alkaline reagents
10 have been employed for the removal of certain ink stains while aqueous solutions containing acids such as oxalic and muriatic acids have been employed for the removal of stains of iron inks. For other types of inks, removers containing oxidizing agents such as a solution of chloride of
15 lime or sodium hypochlorite have been used. In some instances, abrasive agents such as pumice stone, a file or the like, have been employed. When any of the foregoing ink removers have
20 been used to remove inks from the skin or the hands of the user, a serious disadvantage has been encountered in that the skin was left in a bad condition. Furthermore, another serious and practical disadvantage is that the public does
25 not know which remover to employ with a particular ink stain and that in some instances it is practically impossible or difficult to remove the stains of inks like india ink and printer's ink.

We have discovered an ink remover comprising
30 a combination of substances which are capable of removing the stains caused by any ink or a mixture of such inks and which are not injurious to the skin but instead leave the skin in a soft and smooth condition.

35 It is an object of the present invention to provide an ink remover for workers, such as office workers, draftsmen, printers, brokers and those who use inky materials and who use one or more of the common inks, such as ordinary writing ink,
40 typewriter ribbon ink, rubber stamp ink, hectograph ink, ticker tape ink, india ink, carbon paper, and printer's ink, or those who get these inks rubbed off onto the hands from the papers they are handling.

45 It is another object of the invention to provide an ink remover which is efficient and which is capable of manufacture on an economic and practical basis.

50 Other objects and advantages of the invention will become apparent from the following description.

55 A preferred embodiment of the invention contemplates the provision of an ink remover comprising a suspension of zinc stearate in a solution of citric acid in a mixed solvent consisting

of diethylene glycol and ordinary alcohol. The incorporation of zinc stearate in the ink remover serves not only to change the product from a liquid to a cream but also aids, by its absorption, in quickening the process for removal of the ink
60 stains. Other metal soaps such as aluminum stearate, magnesium stearate, zinc oleate, and the like, may be used in place of zinc stearate. It is to be observed that the ink remover will function as a liquid for the removal of stains without the
65 presence of zinc stearate in suspension but not so efficiently.

In preparing our ink remover any appropriate method may be used. A preferred procedure is to dissolve the citric acid, say 300 grams, in the
70 alcohol (900 cc. of 70% alcohol) and to add this to 2000 cc. of diethylene glycol and 500 grams of zinc stearate. By thoroughly mixing the foregoing mixture, a uniform cream is produced. The
75 resulting product or cream is, after complete homogenization, put into tubes, jars or other containers and is ready for use.

A second composition embodying the present invention consists of a cream containing about
80 500 grams of zinc stearate, about 300 grams of citric acid, about 500 cc. 95% ethyl alcohol and about 2000 cc. diethylene glycol.

It is to be noted that diethylene glycol, glycol, triethylene glycol, and glycerin are polyhydric
85 alcohols and that zinc stearate and the other materials mentioned as equivalents are heavy metal soaps. Furthermore, citric acid, tartaric acid and other equivalent acids are organic acids which have six or fewer carbon atoms in their formulae and which are substantially odorless and soluble
90 in 70% alcohol.

Although we have described a preferred embodiment of our invention and have described certain specific agents for use in our ink remover, it is to be observed that other agents may be used.
95 For instance, in place of diethylene glycol there can be used ordinary ethylene glycol, triethylene glycol or glycerin or other polyhydric alcohols but of these diethylene glycol has the preferred viscosity and higher solvent powers. In place of
100 the aqueous diluted alcohol, say 70% alcohol, ordinary alcohol (95%) works well as also does normal propyl alcohol. Methyl alcohol will work but, of course, methyl alcohol is objectionable for a material to be used on the skin due to its being
105 poisonous when absorbed. Citric acid is the preferred acid but tartaric acid or similar acids may be used but with less efficiency.

We claim:—

1. A substantially non-aqueous cream for the 110

removal of ink stains from the skin containing about 500 grams of zinc stearate, about 300 grams of citric acid, about 500 cc. of 95% ethyl alcohol and about 2000 cc. of diethylene glycol. about 500 grams of zinc stearate, about 300 grams of citric acid, about 900 cc. of 70% ethyl alcohol and about 2000 cc. of diethylene glycol.

5 2. A substantially non-aqueous cream for the removal of ink stains from the skin containing

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