

## **Dedication**

**I dedicate to my Father, to my Mother, to Rasheeda, to my brothers and sisters, to my friends, and colleagues, to all who help me.**

## **Acknowledgment**

At first my great thank and love to Allah who helps me to prepare this research, I would like to pass my great thank to my supervisor:

Dr: Ahmed Elhassen Elfaki

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## **Abstract**

This research as a resulting of collecting information about safety in nuclear reactor power plant and its relationship with radiation intensity variation with theoretical background of radiated material, nuclear reactor types and it is technique of working and practical side which takes radiation intensity of radioactive source ( $\gamma$ ).

The only one result that this search has reach is safety procedure in nuclear reactor power plant is very important procedure and must be taken as a series.

All the arrangements even the small details that guaranteed the safety of people inside and outside the nuclear reactor must be done.

## ملخص

هذا البحث هو نتيجة لتجميع معلومات عن السلامة فى المفاعلات النووية ,وعلاقتها بالتغير فى شدة الإشعاع مع خلفيه نظريه عن المواد المشعه , وأنواع المفاعلات النووية والتقنيه التي تعمل بها مع الجانب العملى لقياس شدة الإشعاع من مصدر مشع لاشعة (γ) .

النتيجة الوحيدة التي توصل إليها هذا البحث هو أن عميلة السلامة فى المفاعلات النووية هى عمليه مهمة جدا ويجب أن تؤخذ فى غاية الجديه.

كل الإجراءات و حتى التفاصيل الصغيره منها والتي تضمن السلامة للناس داخل وخارج المفاعل النووي يجب أن تنفذ .

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