

INDIRANI COLLEGE OF NURSING

LEVEL OF STUDENT – P.B.BSc I yrs

ADDISON'S DISEASE

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HOD

PRINCIPAL

ADDISON'S DISEASE

Introduction

Addison's disease (also known as primary adrenal insufficiency or hypoadrenalism) is a rare disorder of the adrenal glands. It affects the production of two hormones - cortisol and aldosterone. Cortisol is released in stressful situations and helps to maintain your energy levels, your blood sugar levels and carbohydrate metabolism. Aldosterone maintains the balance of salt and water in your body, which helps to control blood pressure

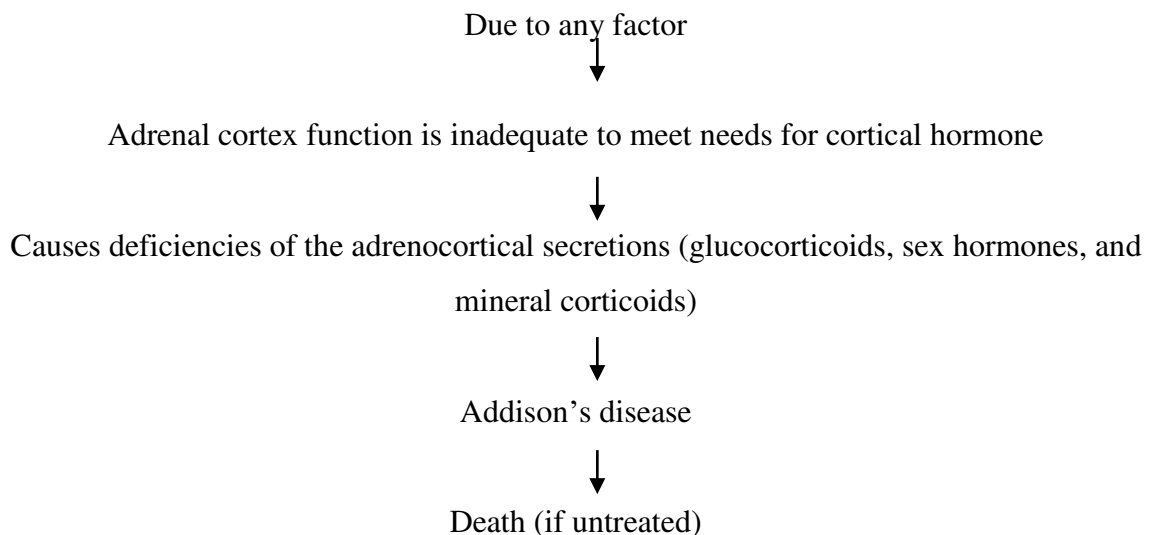
Definition

A disease characterized by progressive anaemia, low blood pressure, great weakness, and bronze discoloration of the skin. It is caused by inadequate secretion of hormones by the adrenal cortex.(Gluco-corticoids and mineralocorticoids)

Etiology

- Auto immune response
- Inadequate secretion of the Adrenal Hormone
- Infection of the Adrenal gland
- Atrophy of the adrenal cortex

Pathophysiology



CLINICAL FINDINGS

- Fatigue
- Muscle weakness Muscle/joint pain
- Increased Insulin Sensitivity

- Nausea
- Anorexia (decrease in appetite)
- Irritability
- Depression
- Dehydration
- Hyperpigmentation
- Abnormal Pain
- Hyponatremia
- Hypotension
- Hypoglycemia
- Hyperkalemia
- Hypovolemia
- Vomiting
- Diarrhea
- Constipation
- Mouth lesions
- Decrease in body hair
- Weight Loss
- Low BMR

Diagnostic Findings

- History collection
- Physical examination
- ACTH Stimulating Test
- 24 Hrs urine studies
- Lab studies(Decrease glucose and sodium level and Increased potassium and WBC level)
- Blood Chemistry(Plasma cortisol and aldosterone level)

Management

- Hormonal replacement therapy
- Increased sodium intake
- Life long drug maintenance is required

Medications

- Administer medications to replace the low hormone levels of cortisol and aldosterone
- For replacing cortisol:
 - ex: Prednisone, Hydrocortisone

For replacing aldosterone:

- ex: Fludrocortisone aka Florinef

Patient Education

- Increase salt intake during hot weather and heavy exercise
- Never skip a dose. This could lead to an Addisonian crisis.
- Learn to recognize the symptoms of an Addisonian crisis. (Ex: pain in lower back, severe vomiting and diarrhea , extreme weakness, fainting.-Contact physician immediately.)
- Wear Med alert tag
- Frequently monitor weight
- Reframe from stressful activities

Nursing Consideration

- Monitor BP and weight
- 2hr postprandial glucose test.
- Chest x-ray if prolonged treatment.
- Electrolytes (k+); I&O ratio (decreasing output and increasing edema).
- Plasma cortisol levels (norm: 6- 23mcg/dL); signs of infection cardiac symptoms (edema, HTN)
- Monitor patient frequently for dysrhythmias
- Administer NaCl IV to increase sodium
- Administer Insulin
- Administer an antiemetic as tolerated by the patient
- Provide high calorie snacks and finger foods
- Daily weight
- Nutritional supplements

Complication

- Hypotension
- Nausea and Vomiting

- Weakness
- Coma
- Psychological Stress

Nursing Diagnosis

- Electrolyte Imbalance r/t vomiting, diarrhea hyperkalemia and hyponatremia
- Imbalanced nutrition: less than body requirements r/t anorexia, decrease in weight and inadequate food intake.
- Fluid volume deficit r/t renal loss of sodium and water.
- Activity intolerance r/t decreased cortisol production and fatigue.

Watch for Addisonian Crisis

This develops when Addison's Disease isn't treated.

In Addisonian crisis, the patient has extremely LOW CORTISOL levels (life threatening).

Remember the 5 S's

1. Sudden pain in stomach, back, and legs
 2. Syncope (going unconscious)
 3. Shock
 4. Super low blood pressure
 5. Severe vomiting, diarrhea and headache
- NEED IV Cortisol STAT:
 - **Solu-Cortef** and IV fluids (D5NS to keep blood sugar and sodium levels good and fluid status)

Watch for risk for infection, neuro status (confusion, agitation), electrolyte levels (sodium and potassium, glucose)

References

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