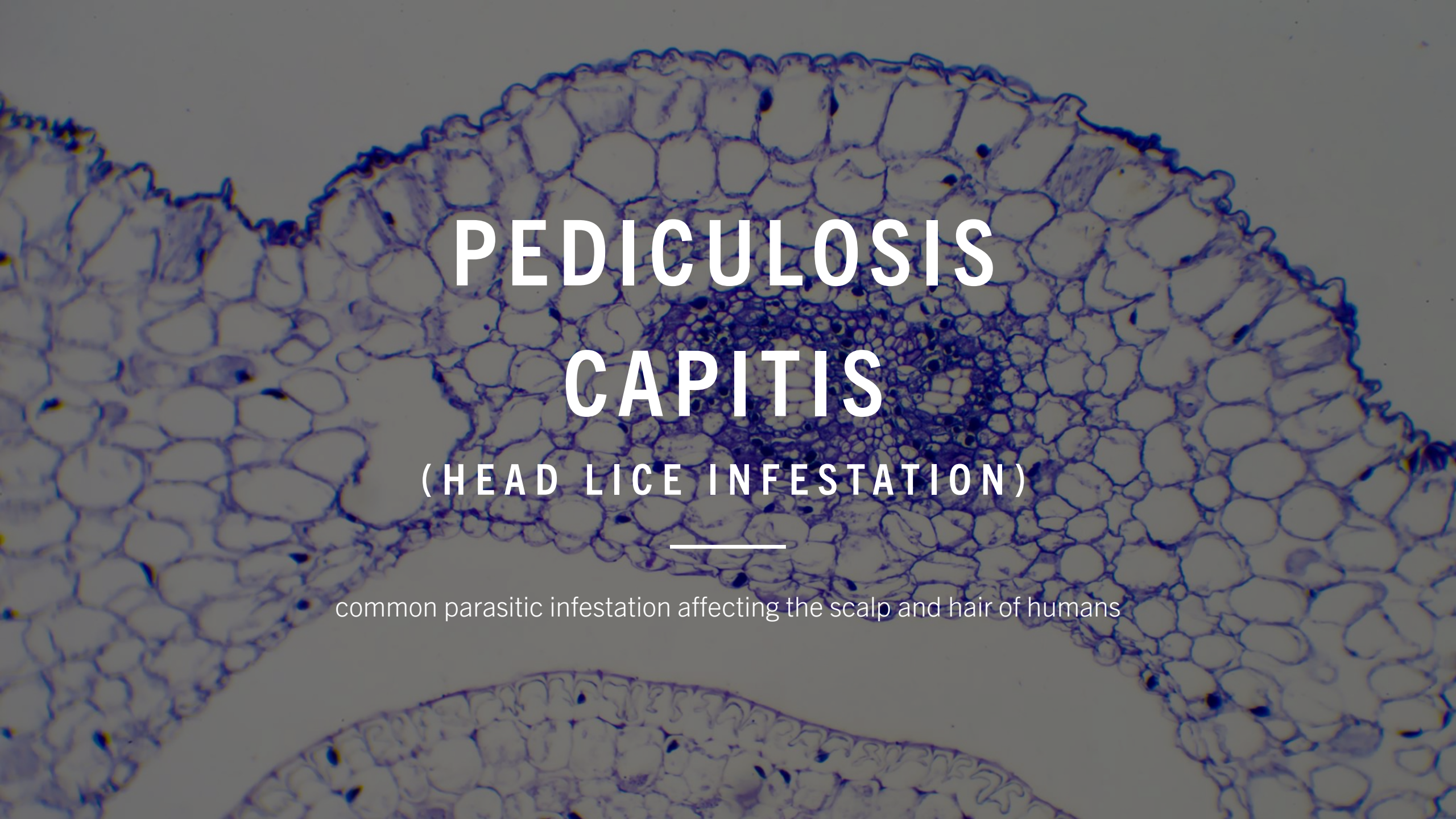




PEDICULOSIS CAPITIS (HEAD LICE INFESTATION)

common parasitic infestation affecting the scalp and hair of humans

WHAT ARE HEAD LICE?

- Head lice are small, wingless insects that infest human hair and feed on blood from the scalp.
- Three kinds of lice infest humans:
- 1) *Pediculus humanus* var. *Corporis* (body louse)- largest
 - 2) *Pediculus humanus* var. *Capitis* (head louse)
 - 3) *Pthirus pubis* (pubic or crab louse)- smallest

15.15: A head louse nit (egg) (Courtesy of Department of Dermatology, T.N. Medical College, Mumbai).

Most common in children especially girls with long hairs

Diagnosis: Made by seeing the lice in the scalp or more often nits glued to the hair shaft in the retro auricular and occipital region of the scalp.

- Nits=the egg of a louse or other parasitic insect

Other types

Pediculosis corporis/VAGABOND'S DISEASE

Pediculosis pubis

PEDICULOSIS CORPORIS

- VAGABOND'S DISEASE
- Disease of the unclean
- Body lice live and lays their nits in the seams of clothing and come to skin surface only to feed
- Induce pruritus → leads to scratching, copper-coloured macules, wheals, lichenification, and secondary infection
- Diagnosis : positively established by finding the lice or nits in the seams of clothing
- Body lice are vectors for relapsing fever, trench fever, and epidemic typhus.



g. 18.11: Vagabond's disease: scalp infestation (Courtesy of Dr. K.J.P.S. Puri, Amritsar).



g. 18.12: Vagabond's disease: Trunk involvement (Courtesy of Dr. K.J.P.S. Puri, Amritsar).

PEDICULOSIS PUBIS

- Found in the pubic region as well as hairy areas of the legs, abdomen, chest, axilla, arms and also eyelashes (pediculosis palpebrarum) and scalp rarely.
- Presenting manifestation : itching or crawling sensation
- Transmitted by close sexual contact: screening for STD should be done.
- Diagnosis : a black speck like bodies attached to the root of hair at an angle.
- Occasionally in fair skin individuals one may encounter grey blue macules (maculae cerulae) varying in size from 1-2 cm in the groin, inner thighs, and the sides of the trunk. Probably caused by altering blood pigments.



Fig. 18.13: Phthiriasis: Nits on the eyelashes (Courtesy of Department of Dermatology, T.N. Medical College, Mumbai)

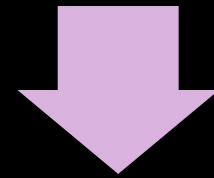


Fig. 18.14: Phthiriasis: Tiny black specks on the axillary hair (Courtesy of Dr. Chetan Oberai, Mumbai).

A background image showing several glass droppers with yellow caps and a multi-well microplate, suggesting a laboratory or medical setting.

TRANSMISSION

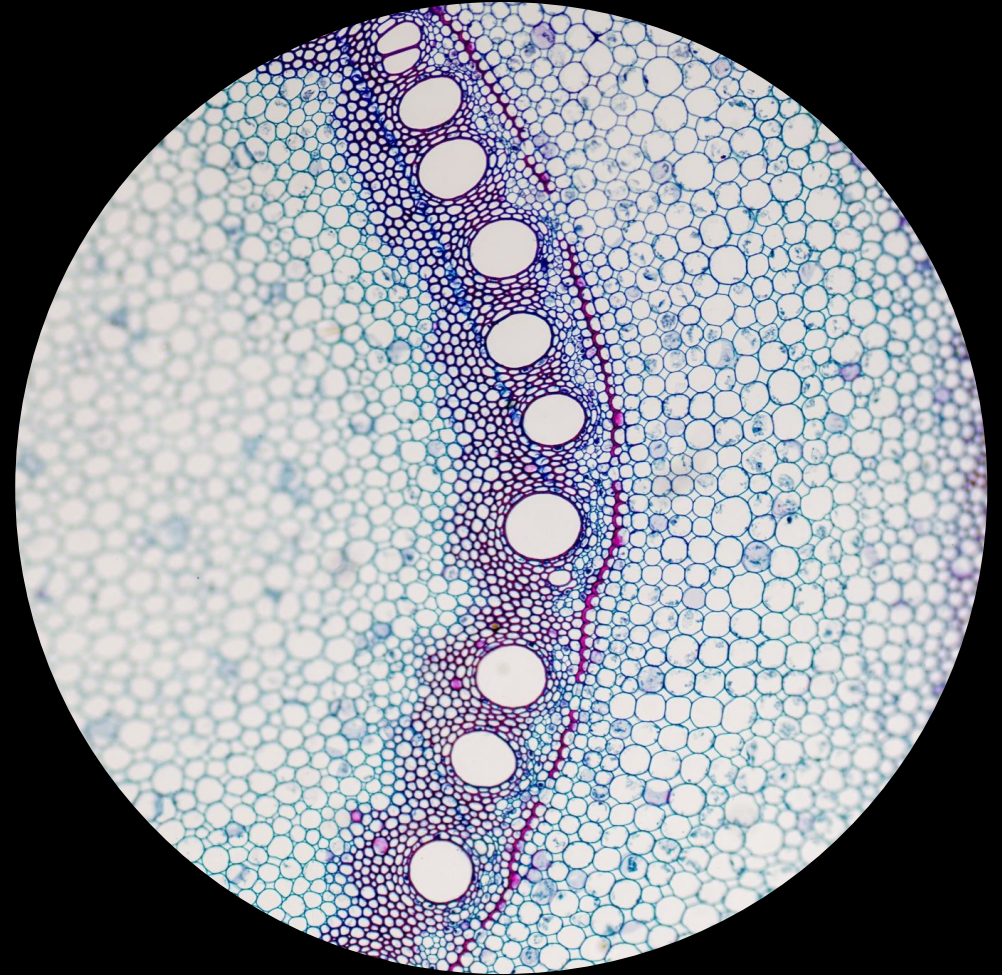
Transmitted by
close sexual
contact



Screening for
STD should be
done.

SYMPTOMS

- Presenting manifestation: itching and secondary pyoderma
- Ova close to scalp – viable
- Peripilar keratin hair cast: remnants of inner root sheath that encircle the hair and mistaken for nits.



TREATMENT

1% permethrin rinse or gamma benzene hexachloride lotion or shampoo.

Malathion, crotamiton, and lindane found effective

Combing with a metal or plastic comb after conditioner (8% formic acid) is an adjunctive measure.

Secondary infection of scalp: oral cotrimoxazole(dual function- treating pyoderma and killing all adult lice)



RX. CONTINUED

Repeat treatment with pediculocidal agents may be necessary after 1 week.

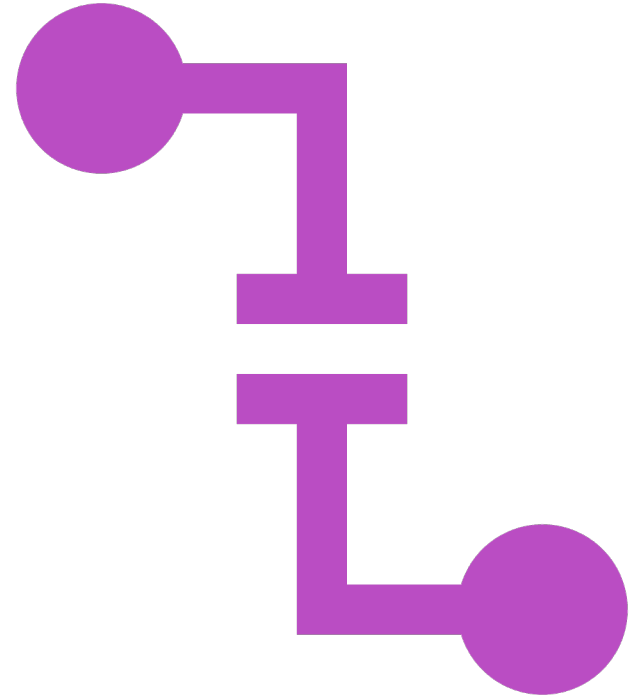
Oral ivermectin (400ug/kg) also used.

Family members and contacts should be treated

Other newer agents include spinosad 0.9% suspension, isopropyl myristate 50% rinse, dimeticone 4% and benzyl alcohol 5% lotion

KNOCKDOWN RESISTANCE

- Permethrin acts by its agonist action at voltage gated sodium channels in the nervous system of insects. Selective point mutations in alpha subunit gene of VGSC result in nerve insensitivity, resulting in resistance known as knockdown resistance.



THANK YOU

