THE KORO EPIDEMIC IN LOWER ASSAM

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SUMMARY

This paper deals with the recent epidemic of koro which occurred in four districts of Assam lasting from later part of June, 1982 to middle of September, 1982. In a survey of 83 cases including 19 females seen by the Psychiatry department of Gauhati Medical College—various socio-economic-cultural factors and clinical symptomatology are analysed. The significant findings are: koro affected mostly young males below 30 years belonging to Hindu Assamese community, coming from middle class families, suffering preponderantly from genital symptoms. Koro attacks mostly occurred during the night when the patients are indoor. Exposure to hearsay and/or witnessing a koro case is an important predeterminant of the episode of illness. In the series, marriage educational status and skill in occupation did not seem to offer any immunity to the victims. Relapses are few. The epidemic subsided without any fatality after massive reassurance to the public through mass media.

Koro as described in a recent textbook of psychiatry is “an acute anxiety reaction characterised by the patient’s desperate fear that his penis is shrinking and may disappear into the abdomen and he may die. Almost invariably the affected person secures a strong hold of the penis sometimes by tying a ribbon around it or by clamping it into a wooden box. Females correspondingly may experience the feeling of shrinkage of breast and labia (Freedman et al., 1976).

As early as in 1834, Pao described this condition as a serious state of emergency requiring immediate treatment failing which death might ensue (Gwee, 1963). Yap (1965) in his series of 19 cases of koro collected over 15 years stressed a number of points, i.e. affected person having poor education, possessing immature dependent personality and lacking confidence in his own virility. He emphasized on the need to recognise a class of “a typical culture bound psychogenic psychosis”, to which the koro is held to belong.

So far koro is found to be confined to South Chinese population in South East Asia specially Malaysia and Indochina (Rin, 1965; Kiev, 1972; Gwee, 1963). Sporadic cases have been reported to occur in Canadians (Dew et al., 1973; Lapierre, 1972), in an American schizophrenic (Edward, 1970), in Sudanese (Baasheer, 1963) and in Indians (Shukla et al., 1981; Chakravarty, 1982). Koro occurring in epidemic form in Singapore in 1967 was reported by Ngui (1969) who reported a series of 228 cases confirming the predominance of the disease in Chinese and also presence of personal and cultural concept of koro as important predeterminant factors in development of this disease.

Recently the state health authority of Assam had to face a unique situation as dozens of SOS messages kept pouring in from doctors working in rural, sub-divisional and district hospitals and also petitions from public leaders. One such wireless-transmitted message from a sub-divisional office in later part of June, 1982 said “Shrinkage of testicles of males and nipples of females affected 8 villages since mid-June. No definite disease could be

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established. No death. No relapse. Please send experts”. Team of experts consisting of senior physicians and a neurosurgeon accordingly visited the affected western border of Assam, who opined that there was no disease, only a fear psychosis based on rumour, concerning the first case of koro—a 16 year Assamese Hindu school boy from North Kamrup who was brought for consultation to the department of Psychiatry, Gauhati Medical College. He was a panic striken adolescent boy—who was seen grasping his penis by his hand. Since then, we encountered cases of koro often coming in batches to our out patients as well as private clinics.

As this disease started with tingling sensation over the legs it was named as ‘Jinjinia’ as in Assamese, ‘Jinjiniya’ means tingling. After diagnosing this epidemic to be an epidemic of koro, a team was formed immediately which decided to undertake the following steps to combat the epidemic.

(1) A special case history sheet was improvised so that we can have a uniform case record.

(2) Arrangements were made for on-the-spot-study of areas affected by epidemic.

(3) Uniform plan of treatment and management envisaged.

(4) For mass education in consultation with the State Govt. Health Secretariat press notes were released through various mass media.

(5) Contacts were established with all practitioners of the affected areas.

MATERIAL

Our case material consisted of 83 cases who were seen by us in the psychiatric out patient, clinics, in private clinics and in on-the-spot-study tour of affected areas. All cases were interviewed at least by two of us— as per our improvised case history and were managed as per our adopted regime of treatment. Review was made as and when necessary. Elaborate history was taken from the accompanying persons as regards predisposing and precipitating factors and any information about any visitor from South East Asia or China.

RESULTS AND DISCUSSIONS

4 districts of Lower Assam were under the grip of the epidemic since later part of June, 1982 to the middle of September, 1982. The duration of epidemic in a particular area was for 3-5 days. As per the record of the State Health Authority, no fresh cases were reported after 11th September, 1982. This date was significant as massive re-assurance and health educative measures were taken in the first week of September through various mass communication media often with use of microphones in the interior of villages. After this mass propaganda, the epidemic suddenly came to a halt.

DISTRIBUTION OF EPIDEMIC

4 districts, viz. Goalpara, Kamrup, Darrang and Nowgong out of 10 districts of Assam were affected. The epidemic spread from west to east. The District Health Authority of Kamrup, where Gauhati Medical College is situated, had a total of 91 cases of which 21 were those who were also seen by us. But considering the degree of panic generated amongst the inhabitants, the total of our series and of District Health Authority’s series were rather small. The reason perhaps is that the disease was such that majority of the cases got ‘cured’ without any medical help.

The epidemic seemed to jump from one village to another. Some of the villages miraculously ‘escaped’ from it’s grip in spite of their close proximity to the affected areas.

Sex: 64 out of 83 cases (77.1%) were males and 19 were females showing that koro has a preponderent affinity towards male sex.
Age: Age ranged from 1½ years to 40 years. This youngest 1½ year old Hindu male child undoubtedly was the victim of his mother's anxiety. Another 4 year old Christian boy actually complained of penile shrinkage in colloquial terms. 46 out of 83 cases (55.4%) belonged to the age group of 20-29 years. There were 29 cases in the age group of 10-19 years. No single case was recorded with age above 40.

Marital Status: 49 out of 83 cases (59.0%) were unmarried whereas 33 were married. One was a widow. Marriage as such did not matter in producing or preserving the phenomenon.

Religion: 69 out of 83 cases (83.1%) were Hindus, 13 (17.3%) were Muslims and 1 was Christian. 51 (61.4%) belonged to Assamese community comprising of Hindu, Muslim and Plain Tribals, 20 (24.1%) were Bengalees both Hindus and Muslims and 1 was a Rajasthani. This series did not contain any person of Chinese origin or a person who had migrated recently to Assam from South East Asia. This finding is rather interesting as it contradicts the common belief that koro is a culture bound disease exclusively confined to people of Chinese origin of South East Asia. It also calls for more elaborate sociological and anthropological research for understanding the psychodynamics of koro.

Occupation: 22 out of 83 (26.5%) cases in each group were skilled and unskilled workers. 19 cases were students of various standards, 12 were housewives, 6 were semi-skilled workers. There were 2 minor children in this series.

Socio-economic status: 48 out of 75 (61.3%) belonged to middle economic class, 22 (26.5%) belonged to lower economic class and 5 belonged to upper class. In 8 cases socio-economic status were not recorded.

Education: 37 out of 83 (44.6%) were educated up to higher secondary level, 16 were illiterate, 8 were graduates and 3 were engineering students lawyer-cum-chartered accountant and Radiographer. Education thus provided no immunity to the misconceptions centering around human reproductive biology.

Time and place of Attack: 53 out of 73 (74%) attacks started when they were indoors, and in 20, while they were engaged in outdoor activities and in educational institutes. In 10 cases, there was no record of place of occurrence.

As regards time of occurrence, 58 out of 73 cases (79.4%) showed first manifestations during the hours 6 p.m. to 6 a.m., with a maximum record between 7 p.m. and 1 a.m., while they were studying or sleeping. In 15 cases 'attack' occurred during the day. In 10 cases the time of occurrence was not recorded. This confirms the findings of Ngui (1969) that koro attacks are more prone to develop at night when a person gets more time for introspection, sexual fantasies, sexual stimulation and sexual acts.

Presence of history of hearsay or witnessing a koro patient: In 60 out of 83 cases (72.3%), there was definite history of hearsay, discussion or witnessing a koro case that very day or 2-3 days prior to the onset of illness. Most cases admitted "apprehension or preoccupation with fear of contracting this so called dreadful and killer disease".

Duration of attack: Attacks lasted from 5 minutes to 5 hours with an average duration of 25 minutes.

Symptoms: The symptoms found in koro cases were classified under 3 subgroups:

1. Genital Symptoms: Shrinkage and inward pull of the penis in males and in the case of females, shrinkage or inward pull of the breast.

2. Anxiety Symptoms: Fear, apprehension, palpitation, sweating, sinking feeling, air hunger, extreme retrosternal pain, extreme thirst, restlessness and feeling of impending death.

3. Disturbed State of Consciousness: Ting-
ling sensation starting from the toes creeping upward leading to dizziness and fainting attack which may vary from semi-conscious state with bizarre movements in total dissociation of variable duration.

9 out of 19 female cases (47.3%) suffered from genital symptoms in form of shrinkage or pull of the breast. Not a single female complained of labial shrinkage. 12 out of 19 cases (69.1%) reported retrosternal pain and other anxiety symptoms subsequently leading to dissociation of varying degree and duration. In almost all cases anxiety symptoms manifested first. 33 out of 47 (70.1%) male cases came with shrinkage and inward pull of penis. Three of them tied the penis with rubber bands and ribbons. In most cases the sequence was anxiety symptoms followed by genital symptoms. Complete dissociation was not seen in male cases. Almost all male cases came wearing dhoti, loongi, or gamocha so that they could prevent the genitals moving inwards by grasping as and when necessary.

Sexually predisposed personality: In almost all cases in our series attempts to evaluate sexual over-indulgence, heterosexual and homosexual relationship, auto-erotic activities and other forms of sexual perversions were made. But this series of koro cases did not disclose any masked or overt sexual perversion or over-indulgence than a similar sample in the general population. There was also not a single case of over indulgence in alcohol or drugs in this series.

Relapse : Only 10 out of 83 cases (12.04%) had a history of relapse within 30 days of illness. They had relapse 1 to 5 times and came for reconsultation. Only 2 out of these 10 cases came with relapse of genital symptoms. The rest came with symptoms of anxiety and depression. One student of B.A. class came repeatedly as he was convinced that during the first attack his penis had been grasped so tightly by his father that it had been damaged permanently.

Associated illness : In this series we had one adolescent school girl with a past history of epilepsy and another with a past history of rheumatic chorea which seemed to have no relevance with the present condition.

Treatment : Only cases with moderate to severe intensity were given mild doses of diazepam and occasional anti-depressant when indicated. The rest were treated with massive reassurance and supportive psychotherapy with gratifying results of immediate diffusion of anxiety.

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