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OCCURRENCE OF WATER BORNE DISEASES IN BILASPUR DISTRICT

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The health problem and practices of a society are often influenced by the interaction of its socio-economic, environmental as well as political factors. A holistic perspective enables us to perceive how common beliefs, customs and practices are connected with health & disease and ultimately determined the health seeking behavior of a community environmental factors especially ecological factors sometimes have a profound influence on health (chaubey, R 2001)

Disease as the Oxford English Dictionary defines as a condition of the body or some part of organ of the body which is functions are disrupted or dearanye'. (Park, K. 1997). In fact the state of imbalance between man and environment results in diseases. Thus the diseases may be defined as maladjustment of human organism to the environment. The factors such as agent, host and environment are of cordial importance representing the basic concept of disease ecology (Agniohotri, PC. 1995).

The study of diseases is the study of man & environment the term environment defined as all that which is external to the individual human host living and non living and with which he is a constant interaction. This includes all of mans external surroundings such as air, water, food, housing etc. (Park K,1997). Two basic various form of diseases are environmental diseases & deficiency diseases. Diseases that are related directly or indirectly due to environment known as environmental diseases while the deficiency diseases are occurred due to lack of one or more nutrients in the diet taken concurrently by a section of population for a considerable period of year, (Dabhadkar K, 2004). Epidemic diseases and endemic disease, pandemic diseases are a another kind of diseases among these Pandemic disease can be clumtisel into three group (1) communicable, (2) Non-communicable. Transmission of germs through water, air, plants, or any object is responsible factors for communicable diseases. Most of such diseases are transmitted from one source of infection to a sustainable host in a variety of ways, any how diseases transmitted by water is mostly occurred as epidemic diseases, water is the most important means of transmission in many parts of the world because it is consumbed by every one in more quantity in Canasisam to food, milk and other. It contamination is more the outbreak of diseases may be explosive viz viral, hepatitis and cholera.

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Water borne diseases account for on estimated 3.6% of the total daily global burden of disease. WHO estimated that 58% of that burden, or 84200 deaths per year is attributed to

the lack of safe drinking water (Wikipedia) supply, sanitation and hygiene.

Objectives of the study:

The main objective of the present work to study of water borne diseases in the Bilaspur

region and its region distributes.

Study Region:

Bilaspur is an important northern district of the Chhattisgarh extended from 21'27'.

North to 23'7' north latitude and 81'12' East to 83'40' east tongitude over an 6736.76 seq.

km. of area. The District is divided into two physical region, northern hilly coverage height

825 mtrs) and southern plain (240) drained by tributaries of Sheonath river. Total

population of the district according 2011 census is 2662077 persons 63.5% of the total

population is literate, Arithmetic diversity of the district is 232 persons/sq.km. Work

participation role of the district is 42-91 percent of which male consists 58.73 and female

work participation rate is 41.27%. Paddy (63.28%) is the main crop followed by wheat &

pulses that covers 33.24 percent of the total cropped area. There are 73 allopathic hospitals,

43 primary health centers, and 303 health sub centre 77 Ayurvedic, 1 yunanti& 9

Homeopathic health centers along with 1079 health person that serves the population of

2662077 persons of the district.

Methodology:

The whole study is based on secondary data collected from the district health centre to

observe the spatial pattern of diseases morbidity indere has been calculated. The morbidity

Indere may be expressed as the ration between numbers of cases reported in an area to the

number of cases expected. Thus the mobidityIndere has been calculated using following

formula:-

MI = OC/ECx100

MI +> Morbidity Indene

OE -> observed cases

 $EC-Expected\ cases$

Spatial pattern of water borne diseases in Chhattisgarh.

Water borne diseases are continuously increase in Chhattisgarh due to rain and non-

availability of potable water to most of the house holding specially in rural areas by the year

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of 2013 more than 50]000 persons were taken ill due to water borne diseases (July 28, 2013) cholera, diarrhea and jaundice are common in the state. As per the data available with the health department of astroentitis and diarrhea are the most common diseases and over 200 people have died due to if in the past three year. In fact diarrhea claimed 154 lives during the period. In 2010, as many as 1.65 lakh people fell ill due to various water borne infection, in 2011, 1.26 lakh and in 2012 nearly 1.25 lakh people were infected and 46 succumbed in the Chhattisgarh State,

In Bilaspur District the occurrence of water borne diseases is observed in all most of all Tahsil. In rainy season the intensity of such diseases increase following all the data shown the spatial pattern of water borne disease in rural areas of Bilaspur district.

Table 1.1 Distribution of Water Borne Disease in Bilaspur District (2008-010)

S.No.	Block	Diarrhea		Dysentery		Gastro	
		Total	Death	Total	Death	Total	Death
1.	Masturi	2241	37	2026	10	130	5
2.	Bilha	3893	31	3732	23	690	11
3.	Takhatpur	2456	55	1063	12	186	5
4.	Kota	1824	60	3590	13	393	8
5.	Pendra	447	17	406	9	103	6
6.	Gourella	1436	47	931	14	146	5
7.	Marwahi	162	25	1053	19	56	2
		11659	272	12828	100	1704	42

Block	Pechis		Juadice		
Masturi	436	8	65	6	
Bilha	894	8	50	4	
Takhatpur	<i>7</i> 25	22	55	3	
Kota	1004	31	108	10	
Pendra	682	57	180	21	
Gaurella	1530	70	432	32	
Marwahi	2270	270	225	29	
	7441	466	1115	78	

Source: District Health Office, Bilaspur (2008-10)

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Diarrhea & Dysentery

It is the most common water borne disease that occurred due to when adequate water is not avail for personal hygiene. It is therefore termed as the diseases of unwashed hand. In the district diarrhea is observed all bleeds. In plain area the occurrence of diarrhea is comparatively more than northern region. Maximum diarrhea cases claimed in Bilha Block followed by Takhatpur (2456 person). In northern Pendra Region it is law .63 morbidity rate only. It is spread due to contaminatation both man & animal used the water from same take, people washed their clothes in the same water, this process ultimately contaminated the water. No. of deaths observed due to diarrhea in the district is Dysentery is to disease observed during winter & shabby season. The morbidity rate of this diseases is highest in Kota Block with 4.58 while in Pendra it is lowest (.5) environmental factors such as low level of personal hygiene and lack of drinking water are the main cause for the high morbidity role of disease. It is second mostly observed water borne disease in the study region. About 12828 persons are suffe from Dysentery every year. Kota is the highest dysentery prone area of the district whined death on dysentery is 60.,Bilha, maintain are the other blocks where more than 30-37 persons dead every year by dysentery (Table 1.2).

Gastro Entitis

It is a disease of bacterial origin and transmitted through food and water borne infection. In rural areas people are suffering with the problems of water scarcity and poor environmental sanitation especially in summer. The morbidity Index of this disease is comparatively less than Diarrhea & Dysentery. It ranges .07 to .51% in the study region. Most of the cases are observed in Kota Block while in northern part it is low (.07-0.1%). The death cases of Gestroentities in district is 42.

Jaundice:

Among various causes of jaundice the infective jaundice is caused by the viruses, of this hepatitis AE viruses are commonly acquired through water contaminated water is considered to main source of infection jaundice cases are more observed is summer due to more chances for intake of contaminated water. Due t inter mitten water supply.

In the study region the morbidity Index of jaundice is not much only 0.04 to .311 highest cases observed in Marwahi block while lowest in southern Masturi, Bilha&Takhatpur Block (0.04) highest deaths case observed in Pendra Region ignorance, inviolability of safe, drinking water is main course preventions & recommendation of water borne diseases.

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Table 1.2

BilaspurDistrict: Morbidity Index of Water borne disease (2008-10)

Home of Block	Diarrhea	Dysentery	Gastroentitis	jaundice
Masturi	1.9	1.7	.11	0.05
Bilha	2.5	3.06	.5	0.04
Takhatpur	1.6	.85	.14	0.04
Kota	2.3	4.58	.59	0.13
Pendra	.63	.5	.14	0.25
Gaurella	1.35	.87	.1	0.40
Marwahi	0.2	1.49	.07	0.311

Source: District Health Office, Bilaspur (2008-10)

In the study region water borne diseases are very common specially diarrhea Dysentry to prevent the spread some precautionary measure should be taken that are as follows:

- (1) Good sanitations
- (2) Precautions with drinking water and avoiding contaminated foods.
- (3) Since contaminated water is the main culprit, it is necessary that drinking water must be hygienic and in rural sector the practice of the use of water of tanks for all purpose should be avoided.
- (4) Awareness regarding the use of water and water bodies is equally important.
- (5) People's participations towards the cleaning of the surrounding of the water sources is essential.
- (6) Govt. should laid down the tape water, hand pump supply in rural areas also.

Reference:

1. Agnihotri, R.C. (1995) : Geo medical environment and health care, Rawat

Publication New Delhi.

2. Park K. (1997) : Prevention & Social Medicine B.B. Publication,

Jabalpur.

3. Sharma KKN, (2001) : Rural health K.K. Publication Allahabad.

4. Choubey K. (1986) : "Health services in Madhya Pradesh. Geographical

Review of Indian vol. 48, No.2

5. Dr. Srivenu (2011 : https:/kimshospitalhyderabad.wordpren.com.

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