



## उत्तराखण्ड अधीनस्थ सेवा चयन आयोग,

थानों रोड, रायपुर, देहरादून।

(दूरभाष/फैक्स-0135-2669658 ई-मेल-chayanayog@gmail.com)

Syllabus for the Post Advertised in Advertisement No. 45/उ०अ०से०च०आ०/  
2022 दिनांक 08 जनवरी, 2022 के संदर्भ में:-

विज्ञापन संख्या 45/उ०अ०से०च०आ०/2022 दिनांक 08 जनवरी, 2022 के अंतर्गत विज्ञापित पदनाम मत्स्य निरीक्षक पद पर चयन हेतु 100 अंकों की वस्तुनिष्ठ प्रकार (Objective type with Multiple Choice) की 02 घंटे की एक लिखित परीक्षा होगी। जिसमें पदों की न्यूनतम अर्हता से संबंधित विषयों पर आधारित प्रश्न होंगे। लिखित परीक्षा का पाठ्यक्रम आयोग की वेबसाइट पर प्रकाशित है।

(संतोष बडोनी)  
सचिव।

**Syllabus for the Post Advertised in Advertisement No. 45 / उ०अ०से०च०आ० /  
2022 दिनांक 08 जनवरी, 2022**

**Fish & Fisheries**

**UNIT-I**

**Introduction & Classification:**

General characters and classification of fishes (up to classes), Basic Principles of Taxonomy, Brief history of fish & fisheries; Fish diversity (number, size, habitat and behaviour); Techniques in fish identification (morphological, morphometric and meristic characters); Study of fish fauna (with special reference to Uttarakhand).

**UNIT-II**

**Morphology & Physiology:**

Types of scales; Use of scales in age determination; Types of fins and their modifications; Locomotion in fishes; Types of gills; Accessory respiratory organs; Swim bladder; Weberian Ossicles; Physiology of respiration; Food & feeding habits; Digestive system; Physiology of digestion; Excretion and osmoregulation; Lateral line system; Reproductive strategies; Breeding season; Breeding habits; Factors responsible for breeding; Fecundity; Gonadosomatic index; Secondary sexual characters; Parental care,

**UNIT -III**

**Fisheries:**

Capture and Culture Fisheries; Inland Fisheries (riverine, lacustrine and reservoir fisheries); Estuarine fisheries; Marine fisheries; Coldwater fisheries; Fishing crafts and gears; Migration; Impact of Dams on fisheries; Depletion of fishery resources.

**UNIT- IV**

**Aquaculture:**

Principles of Aquaculture; Sustainable aquaculture; Extensive, semi-intensive and intensive culture; Cultivable fishes (Indian Major carps, Chinese carps & Catfishes); Air breathing fishes; Setting of a fish farm; Pen Culture; Cage Culture; Polyculture; Composite culture; Brood Stock management; Artificial Breeding; Induced Breeding; Stocking material (Collection from Natural resources & bundh breeding, fish seed, fish seed trade); Transportation of fish seed; Types of hatcheries and hatchery management; Nursery and Rearing pond management; Fish food organisms; Fish nutrition and feed technology; Common Fish diseases (viral, bacterial and fungal); Harvesting; Fish spoilage; Fish Preservation and processing; Fish products and by-products; Fish transport and marketing.

**UNIT-V**

**Miscellaneous:**

Hill stream fishes and adaptation; Special adaptations (Electricity and Bioluminescence); Larvivorous fishes; Aquarium Fishes; Preparation and maintenance of aquarium; fishery of nonfish organisms (shell fish & Molluscs); Transgenic Fish; Fishery Extension services; Fisheries cooperatives; role of NABARD in fisheries development; Fishery institutes of India; Fishery laws and regulation.

