# URBAN DEVELOPMENT POLICY & STRATEGY FOR SIKKIM 2021 AD

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# 1. BACKGROUND, GOALS, OBJECTIVES & OVER ALL STRATEGY

AREA OF SIKKIM- 7096 SQ.KM IN HIMALAYAS,

SANDWICHED BETWEEN NEPAL, BHUTAN & TIBBET.

110 KM. N TO S AND 65 KM. E. TO W.

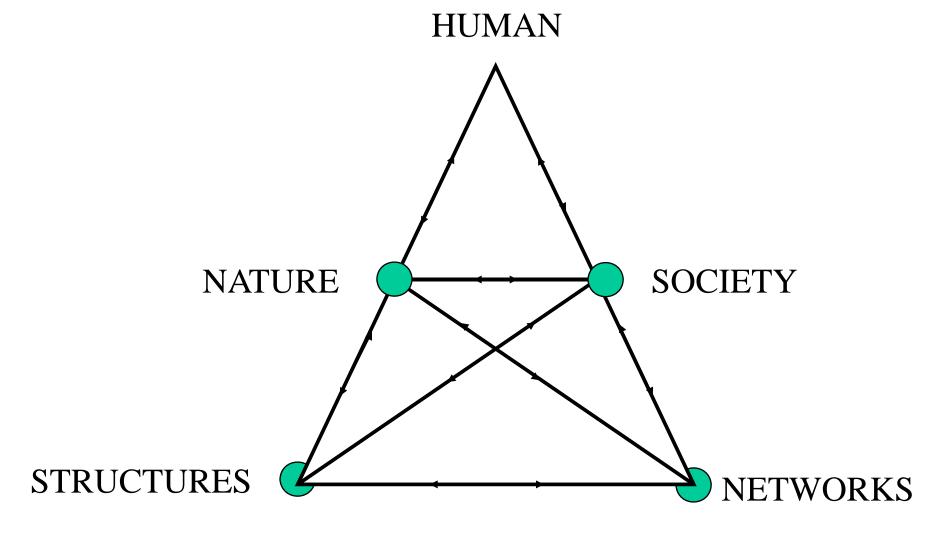
SMALLEST STATE EXCEPT DELHI, BUT VERY RICH IN CULTURE, CUSTOMS, HERITAGE, FLORA AND FAUNA

GOALS & OBJECTIVES:

TO IMPROVE THE QUALITY OF LIFE, WHETHER ALONE, IN A FAMILY, OR IN A SOCIETY;

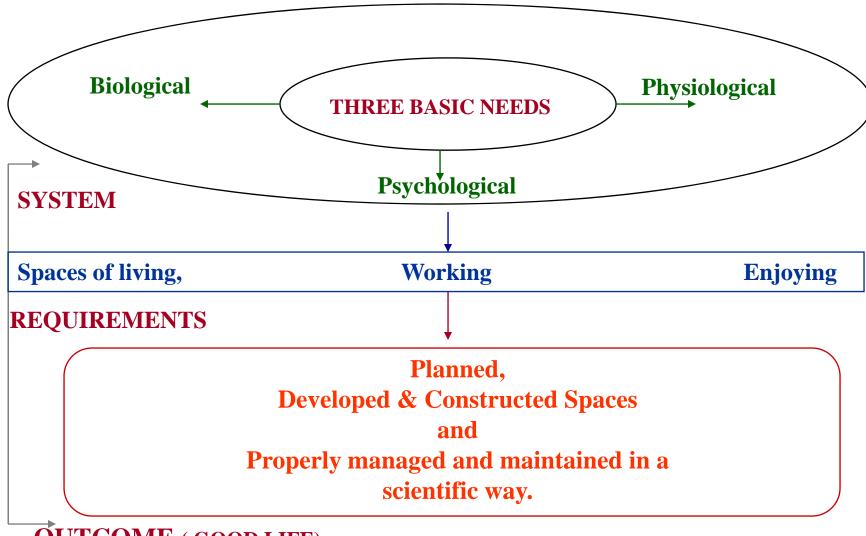
#### ELEMENTS TO IMPROVE THE QUALITY OF LIFE

(ARROWS SHOWS THE RELATIONSHIP BETWEEN THE ELEMENTS)



#### **BASIC OBJECTIVE OF PLANNING**

#### TO IMPROVE QUALITY OF LIFE



OUTCOME (GOOD LIFE)

# OVER ALL STRATEGY: TO INDUCE POSITIVE GRORTH IN SETTLEMENTS WITH TOTAL INFRASTRUCTURE\*.

#### STRATEGY AT 4 LEVELS:

- 1. STATE AS A WHOLE
- 2. 4 DISTRICTS
- 3. URBAN GROWTH CENTERS AND
- 4. BASIC URBAN SETTLEMENTS

## TOTAL INFRASTRUCTURE

PHYSICAL: WATER, SEWERAGE, SWD, SWM & SANITATION, POWER, GAS, COMMUNICATION, TRANSPORTATION - ROADS

SOCIAL: HEALTH, EDUCATION, SECURITY (POLICE & FIRE) JUSTICE, RECREATION, TOURISM, & SHELTER.

ENVIRONMENT: WATER, NOISE, AIR, SOIL POLLUTION & FLORA-FAUNA.

ECONOMIC: EMPLOYMENT, INCREASE IN GDP FROM FROM VARIOUS RESOURCES AND INCOME PER CAPITA.

# 2. DIMENSIONS

GEOGAPHICAL, ADMINISTRATIVE, DEMOGRAPHIC& BROAD LANDUSE.

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ELEVATION (300-5500 M.)
HABITABLE AREA - UP TO 2100 M.
ONLY 20% OF LAND IS HABITABLE
SNOW LINE IS ABOVE 5300 M.
IMPORTANT RIVER - TEESTA
4 DISTRICTS -
                  MANGAN(N), NAMCI
GYALSHING (E) AND GANGTOK (W); 8 SUB-
DIVISIONS, 148 PANCHAYAT UNITS &
                                    453
REVENUE BLOCKS
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#### **DEMOGRAPHIC CHARACTERISTICS**

POPULATION IN 1991 = 405,505 1981 = 316,385 1971 = 209,843

**GROWTH RATE** DURING 1981-91 WAS = 28.17%

90.8% RURAL & 9.2% IS URBAN

DENSITY IN P/SQKM OF VARIOUS DISTRICTS:

SOUTH 131

WEST 84

NORTH 7

EAST 18

AVERAGE OF THE STATE 57

# **BROAD LAND USE**

OUT OF	THE TOTAL	<b>AREA OF</b>	7096 SQKM.

38% OF THE LAND = FOREST.

25% = BARREN LAND.

12% = AGRICULTURE LAND.

15% = PASTURE & GRAZING LAND.

10% = FOR OTHER ACTIVITIES.

# 3. URBAN DEVELOPMENT & LAND POLICY

#### 3.1 URBAN DEVELOPMENT

- I. TO LEAST, 60% OF (25%) = 15 %; AGAINST 9.1% AT PRESENT.
- II. TO BRING BALANCE, IN URBANISATION AT DISTRICTS LEVEL.
- III. TO INCREASE MORE IN NORTH & WEST DISTRICTS, NORMAL RATE IN SOUTH DISTRICT & CONTROLLED RATE IN EAST DISTRICT.

- IV. SIZABLE URBAN GROWTH CENTRES IN EACH.
  DISTRICT TO WORK AS A MAGNATE TO
  ATTRACT POPULATION IN NAMCHI, GEYZING
  & MANGAN.
- V. <u>BASIC URBAN CENTRES</u> INDIVIDUAL SETTLEMENTS, BUT INTER-DEPENDENT FOR SOME FUNCTIONS ON URBAN GROWTH CENTRES.
- VI. <u>RURAL SETTLEMENTS</u> = 1400 IN FOLLOWING CATEGORIES.
  - RURAL GROWTH CENTRE
  - RURAL GROWTH POINT AND
  - RURAL BASIC VILLAGE

### 3.2 LAND POLICY

- LARGE SCALE ACQ. DEVEL. & DISPOSAL OF LAND
- GURGAON MODEL.
- MAHARASHTRA & GUJRAT MODEL

# NEW MODEL OF PARTNERSHIP WITH FARMERS / OWNERS (BECAUSE NONE OF THE THREE MODELS IS APPLICABLE TO SIKKIM)

- PERSPECTIVE PLAN OF 20 YEARS.
- 30% FOR TRUNK & CITY LEVEL FACILITIES & CIRCULATION SYSTEM.
- 20% FOR ZONAL LEVEL FACILITIES .
- 5% AREA FOR EWS USES.
- 45% WOULD BE SHARED. EACH WOULD GET AS PROPOSED:

- 15% OF RES.& IND. FOR GOVT. ON NOMINAL PRICE.
- 80% OF COMM. FOR GOVT. ON NOMINAL PRICE.
- MIN.RES. = 50 SQM, ON NOMINAL PRICE.
- MAX. RES. = 1000 SQM ON NOMINAL PRICE.
- MIN. COMM. = 10 SQM ON NO NOMINAL PRICE.
- MAX. COMM. = 40 SQM ON NO NOMINAL PRICE .
- COST OF ALTERNATE DEVELOPED PLOT IN COMPENSATION.
- FOR LIVELIHOOD A SMALL COMMERCIAL PLOT.

#### RATIONAL DISTRIBUTION OF PRICES OF LAND

#### COST OF DEVEL. PLOT SHOULD BE AS UNDER.

- ACQUISITION INCL. REHABILITATION.
- INFRA. AT INTERNAL & PERIPHERAL LEVEL.
- DEVELOP. OF GREEN & SITES FOR FACILITIES.
- 20% OF TRUNK INFRASTRUCTURE.
- 20% OF MAJOR ROADS EXCEPT HIGHWAYS.
- 20% OF CONSTRUCTION OF P& SP BUILDINGS.
- 20% OF THE COST OF BEAUTIFICATION.

### IF COST OF D. LAND IS RS. X PER SQM THEN SUGGESTED PRICE:

FOR EWS, 50% OF X

FOR MIG X

FOR PARKS & O. SPACES, 15% OF X

FOR EDU. & HEALTH FAC.

COMM. USE,

FOR NON-CONFOR.,

FOR NEW INDUSTRIES,

FOR INFORMAL SECTOR

\*FOR LIG, 75% OF X

\*FOR HIG, 2X ORMORE

30% OF X

4 TIMES OF X, OR

MORE

75% OF X

2X

= 75 % OF X

#### OR ANY CONCERNED G.O

# 4. SETTLEMENT POLICY

- I. TO REMOVE THE REGIONAL DESPARITY.
- II. MODIFY CLASSIFICATION & BOUNDARY OF TOWNS.
- III. EACH DISTRICT SHOULD HAVE ONE LARGE TOWN & EVERY SUB DIVISION SHOULD HAVE A MEDIUM SIZE TOWN.

#### OTHER IMPORTANT POINTS

DESIRABLE SIZE
SYSTEMS
FUNCTIONS
DYNAMICS
PHYSICAL DISTANCE
FORCES OF AGGLOMERATION
ECONOMY
ACCESSIBILITY

# 5. ECONONOMIC & INDUSTRIAL DEVELOPMENT

#### 5.1. ECONOMIC DEVELOPMENT

#### **BREAK UP IN TO ECONOMIC SECTOR**

PRIMARY SECTOR

**SECONDARY** 

**TERTIARY** 

- BETWEEN 6 TO 10 % OF THE POPULATION.
- BETWEEN 15 TO 25% WITH NO POLLUTING, NOXIOUS & HAZARDOUS UNITS.
- **BETWEEN 70 TO 80%**

#### 5.2. OTHER FACTORS

- I. GOOD POTENTIALITY IN HORTICULTURE; AGRICULTURE & ALLIED ACTIVITIES.
- II. PARTICIPATION RATE IN INDUSTRIAL ACTIVITIES INC. IN HOUSEHOLD IS LOW & SHOULD BE INCREASED BY PLANNED STRATEGY.
- III. 31% OF WORKERS ARE ENGAGED IN TRADE & COMMERCE, THEREFORE BE ORGANIZED & REGULATED PROPERLY & RESOURCES EARNED.
- IV. IN-GANGTOK, A GOOD PERCENTAGE OF WORKERS IS WORKING IN SERVICE SECTOR, THEREFORE, IT IS NECESSARY TO PROVIDE PROPER PHYSICAL, SOCIAL, ECONOMIC & ECO. INFRASTRUCTURE FOR THE PEOPLE.

### 5.3. INDUSTRIAL POLICY

#### 1. BACKWARD STATE DUE TO:

- 20% AREA IS USABLE.
- LESS TECHNICAL KNOWHOW WITH LIMITED TECHNOLOGY AND LESS FACILITIES OF PROCESSING STORAGE, TRANSPORTING & MARKETING OF AGRICULTURE PRODUCE.
- ONLY 9% POPULATION IN URBAN SETTLEMENTS.
- LESS THAN 40% OF THE AREAS IS ACCESSIBLE.

# 2. PROPOSAL (INDUSTRY)

- 1. AGRO BASED UNITS, FLORICULTURE, FRUIT & VEG, PROCESSING, STORAGES & MARKETING, ANIMAL HUSBANDRY & DAIRY PRODUCTS.
- 2. CONSUMERS INDUSTRIES FOR A POPULATION OF 15 LAKH BY 2021 A.D.
- 3. UNIQUE TOURIST SPOTS WITH STATUS OF INDUSTRY.
- 4. I.T. INCLUDING HARDWARE & SOFTWARE.
- 5. TRANSPORT INDUSTRY FOR THE POPULATION AS WELL AS IMPORT & EXPORT OF GOODS.

- 6. UNITS TO BE INCREASED FROM 225 UNITS (IN 1995) TO 1500 BY 2021 A.D. IN FORMAL SECTOR & EQUAL NUMBER IN INFORMAL SECTOR.
- 7. VALUE ADDITION TO INDUSTRIAL UNITS DEPENDENT ON SIKKIM RAW MATERIAL WITH THE HELP OF HRD, I.T. & FINANCIAL INCENTIVES.
- 8. EXPORT OF FINISHED GOODS RATHER THAN RAW MATERIAL.
- 9. DEVELOPMENT OF INDUSTRIAL SPACES WITH FULL INFRASTTRUCTURE, WITH COMBINED EFFORTS OF PUBLIC, PRIVATE & CORPORATE SECTOR.
- 10. INFRASTRUCTURE TO BE PROVIDED;
  TRUNK PUBLIC SECTOR,
  PERIPHERAL- PUBLIC & PRIVATE SECTOR
  INTERNAL- PRIVATE SECTOR

- 11. SET UP OF A STATUTORY BODY BY THE NAME OF INDUSTRIAL DEVELOPMENT CORPORATION.
- 12. THE STATE HAS 8000 MW HYDEL POWER POTENTIAL BESIDES A NEW PROJECT OF 1200 MW ON TEESTA RIVER TO BE STARTED.
- 13. MORE POWER SHOULD BE GENERATED AND EXPORT TO OTHER STATES OF THE COUNTRY.

### 6. TOURISM

6.1 TOURIMS IS A COMPOSIT AND INTEGRATED SUBJECT CONNECTED WITH FOLLOWING MINISTRIES / DEPARTMENTS. THEREFOR SHOULD BE PAID DUE ATTENTION ALONG WITH COORDINATION INTEGRATION EVALUATION AND MONITARING

- I. ENVIRONMENT AND FOREST.
- II. TRANSPORTATION.
- III. HRD EDUCATIO.
- IV. HEALTH.
- V. HOTEL, RESTURANT.
- VI. HISTORICAL MONUMENT.
- VII. PHYSICAL INFRASTRUCTURE.
- VIII. FOREIGN EXCHANGE.

#### 6.2 OTHER POINTS

- I. LAND FOR HOTELS SHOULD BE ARRANGED AT REASONABLE PRICES.
- II. NOT ONLY DOMESTIC BUT FOREIGN INVESTMENT SHOULD BE ENCOURAGED.
- III. WAY-SIDE AMENITIES AT VARIOUS ROUTES.
- IV. CONSTRUCTION OF HEALTH RESORTS.
- V. DUE PUBLICITY IN INDIA AS WELL AS IN FOREIGN COUNTRIES.
- VI. INVOLVEMENT OF PRIVATE SECTOR.
- X. SHORT & LONG TERM COMPREHENSIVE AND INTEGRATED PLAN.
- XI. USE OF ADB AND WORLD BANK FUNDS.

### 7. CIRCULATION SYSTEM

#### 7.1 GENERAL POINTS

CIRCULATION SYSTEM IN THIS STATE IS QUITE DIFFERENT THAN OF ANY OTHER STATE WHICH HAVE LOT OF PLANE AREAS. IT HAS FOLLOWING IMPORTANT CHARACTISTICS.

- I. ALIGNMENTS ARE DIFFERENT
- II. HORTIZANTAL AND VERTICAL CURVES
- III. RWS ARE LIMITED
- IV. PARKING OF VECHILES ALONG THE ROADS
- V. BETTER STREET FURNITURE

#### 7.2 SPECIFIC POINT

- I. BY 2011 AD. NUMBER OF URBAN SETTLEMENTS MAY BE 28 THEREFORE, CONNECT THEM BY MAIN ROADS.
- II. A TOY TRAIN FROM SILIGURI TO GANGTOK.
- III. WAY SIDE AMENITIES.
- IV. ROPE WAYS.
- V. EXISTING CIRCULATION SYSTEM SHOULD NOT BE DISTURBED TOO MUCH.
- VI. BUS TERMINALS, AND Q. SHELTERS
- VIII. AIR STRIP AT PAKYONG BE FURTHER DEVELOPED.
- VIII. HELICOPTER SERVICE IN GANGTOK BE IMPROVED.

#### 8. STRATEGY ON HOUSING

- A UNIT TO IMPROVE THE QUALITY OF LIFE.
- HOUSING ESTATES WITH ALL CONNECTED LAND USES
- PHYSICAL, SOCIAL, ECONOMIC & ECO. INFRA. OF LOCAL LEVEL
- 0.5% OF COST ON R & D.
- ONE UNIT PER FAMILY.
- SPECIAL HOUSING FOR SC & ST / SPECIAL CLASSES.
- BUILDING RESEARCH CENTRES.
- EVERY BODY SHOULD WORK ON ENABLING APPROACH.
- PROPER INTEGRATION WITH CONCERNED MINISTRIES & THEIR DEPARTMENTS.
- ONE WAY OPEN ACCOUNT SYSTEM.
- PARTICIPATION OF WOMEN.

- DATA BASE SYSTEM.
- LAWS OF -PRICE CONTROL, RENT CONTROL, PROPERTY RIGHTS, TENANT & LANDLORD RIGHTS BE MODIFIED.
- A CREDIBLE HOUSING FINANCE STRATEGY.
- HOUSING FOR DIFFERENT SECTION OF THE SOCIETY.
- 15-20% AREA FOR SOCIAL INFRASTRUCTURE.
- AMMORTIZATION PERIOD TO 30 YEARS.

#### 9. PRIVATE SECTOR & JOINT VENTURE

- ADMINISTRATIVE ISSUES.
- FINANCIAL ISSUES.
- LANDS ISSUES.
- TECHNICAL ISSUES.
- LEGAL ISSUES.

Above Issues should be formulated and then probable solutions be find out. Details are in a book written by the Author "Shelter for the poor in the Fourth World".

#### 10. ESSENTIALS OF DEVELOPMENT

#### 10.1 SUGGESTION LANDUSE IN TERMS OF RANGE

40-55%
03-05%
10-12%
15-20%
08-12%
04-10%

#### 10.2 DEVELOPMENT / IMPLEMENTATION

(4 INSTRUMENTS)

- 1. DEVELOPMENT ACT
- 2. LAND POLICY
- 3. FINANCIAL POLICY
- 4. MASTER PLANS

THIS PERCENTAGE IS POSSIBLE, ONLY IF ADJOINING POCKET ARE ADDED FOR P&SP AND RECRETAIONAL.

#### 11. PUBLIC PARTICIPATION

11.1 TWO FACADES OF PLANNING PROCESS; WHO MAKES THE PLANS.
FOR WHOM THE PLANS ARE MADE.

#### 11.2 AREAS OF PUBLIC PARTICIPATION

- I. ACQUISITION OF LAND AND BUILT UP PROPERTIES
- II. MASTER PLAN; SECTOR OR ZONAL PLAN;

**ALIGNMENT OF ROADS & INTERSECTIONS** 

ALL THE TRUNK SERVICES; INC. BRIDGES.

- III. DEALING WITH SUB-STANDARD AREAS,
- IV. SHIFTING & SPOT ZONING OF NON-CONFORMING USES INC.

WHOLESALE TRADE;

#### 12. PRIORITY TOWNS

12.1 12 TOWNS AS PER NOTIFICATION DATED 19TH MAY 1992.

GANGTOK TADONG RANIPOOL
SINGTOM RANGPO JRETHANG
NAMCHI GYALZING MANGAN
PAKYONG RHENOCK RONGLI

- 12.2 BESIDES ONE MORE TOWN NAMELY NAYA BAZAR WAS ALSO IN EXISTENCE AS PER 1991 CENSUS.
- 12.3 15 MORE SETTLEMENTS SHOULD BE DECLARED AS URBAN, MAKING A TOTAL OF 28 TOWNS, NAMES AS GIVEN.

1. GANGTOK 3. MANGAN 2. GYALSHING 4. SINGTOM 5. PAKYONG 6. NAYABAZAR 7. TADONG 8. JORETHANG 9. RANGPO 10. NAMCHI 11. RANIPOOL 12. CHUNGTHANG 13. MELLIBAZAR 14. MANIRAM 15. RHENACK 16. RONGLI BHANJAN 17. NEW DIKCH 18. SORENG 19. RAVANGLA 20. DAMTHANG 21. RESHI 22. LEGSHIP 23. DENTAM **24. MAKHA** 25. PHODONG 26. SOMBARE 27. NAMTHANG 28. PEMAYATSE

# 12.4 NAMES HAVE BEEN SELECTED BASED ON THE 3 FACTORS.

- I. POTENTIALITY OF THE SETTLEMENT
- II. TO CONTROL UNPLANNED DEVELOPMENT
- III. TO DEVELOP BACKWARD AREA

#### 13. SPATIAL STANDARDS FOR HILL AREAS

#### AFFECTED BY FOLLOWING FACTORS:

- I. EXPOSURE TO SUNLIGHT AND WEATHER.
- II. DEGREE OF SLOPES; OF 40% / NOT MORE THAN.
- III. ACCESSIBILITY
- IV. NEEDS OF THE PEOPLE IE. BIOLOGICAL, PHYSIOLOGICAL AND OF PSYCHOLOGICAL.
- V. PRESERVATION CONSERVATION OF CULTURE, & PHYSICAL FEATURES.
- VI. FLEXIBILITY IN NORMS & STANDARDS DUE TO DIFFICULT TERRAIN.
- VII. WORK-PLACE & RESIDENCE RELATIONSHIP.
- VIII. ENERGY NEEDS.

IX. ALTERNATIVE MODES OF TRANSPORTATION.

X. COMMUNICATION NETWORK.

XI. MOBILE AND EMERGENCY FACILITIES.

XII. NEED OF OF INFRASTRUCTURES.

XIII. RELATIONS OF ACTIVITIES WITH THE TIME DIMENTIONS.