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**VEER NARMAD SOUTH GUJARAT UNIVERSITY**  
University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

**વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી**

યુનિવર્સિટી કેમ્પસ, ઉદ્ધના-મગદલા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

Tel : +91 - 261 - 2227141 to 2227146, Toll Free : 1800 2333 011, Fax: +91 - 261 - 2227312  
E-mail : info@vnsgu.ac.in, Website : www.vnsgu.ac.in

—: એ કે ડે મિક કા ઉન્સિલ :—

—: કાર્યસૂચિ - ૨ :—

તા. : ૨૩-૦૮-૨૦૨૧

વાર : સોમવાર

સમય : સવારે ૧૦:૦૦ કલાકે

(૨) આંકડાશાસ્ત્ર વિભાગના વડાશ્રીના તા. ૧૯/૦૮/૨૦૨૧ ના પત્રના અનુસંધાને યુનિવર્સિટીના હાલના સ્ટેટયૂટ/ઓર્ડિનન્સમાં Applied Statistics વિષય સામેલ કરવા ચર્ચા વિચારણા કરવા બાબત.  
(બિડાણ : ૧)

(૩) તબીબી વિદ્યાશાખાના અધ્યક્ષશ્રીએ તેમના તા. ૧૯/૦૮/૨૦૨૧ ના પત્રથી મોકલેલ યુનિવર્સિટી સંલગ્ન મેડીકલ / ડેન્ટલ / ફીઝીયોથેરાપી / નર્સિંગ કોલેજોનાં શૈક્ષણિક અને બિનશૈક્ષણિક સ્ટાફ માટે ૨૦૨૧ નું દિવાળી વેકેશન નીચે મુજબ જાહેર કરવા ભલામણ કરેલ હોય જે અંગે ચર્ચા કરવા બાબત.

તબીબી વિદ્યાશાખા માટે

શૈક્ષણિક વર્ષ ૨૦૨૧-૨૨ની સત્રવ્યવસ્થા

દિવાળી વેકેશન :	
પ્રથમ અર્ધ ભાગ :	તા.૨૯/૧૦/૨૦૨૧ થી તા.૧૨/૧૧/૨૦૨૧
કામકાજનો દિવસ :	તા.૧૩/૧૧/૨૦૨૧
દ્વિતીય અર્ધ ભાગ :	તા.૧૪/૧૧/૨૦૨૧ થી તા. ૨૮/૧૧/૨૦૨૧

(૪) યુનિવર્સિટીમાં યુ.જી.સી. માન્ય બેચલર ઓફ ડિફેન્સ સ્ટડી એન્ડ સ્ટેટેજીના કોર્સ શરૂ કરવા અંગે તા. ૨૧/૦૮/૨૦૨૧ ના ઈ-મેઈલ પર ચર્ચા વિચારણા કરવા બાબત.  
(નોંધ :- યુ.જી.સી. માન્ય અભ્યાસક્રમ અને અન્ય યુનિવર્સિટીનો અભ્યાસક્રમ આ સાથે સામેલ છે.)  
(બિડાણ : ૨)

(૫) યુનિવર્સિટી સંલગ્ન કોલેજો ખાતે પરીક્ષાને લગતું સાહિત્ય, પેપર, માર્કશીટ મોકલવા તેમજ ઉત્તરવહીનું કલેક્શન તથા પહોંચાડવા જેવી અત્યંત અગત્યની અને સમય મર્યાદાની કામગીરી માટે હાલમાં યુનિવર્સિટીએ નિયત કરેલ ભાડાના વાહન દ્વારા કામગીરી કરવામાં આવી રહી છે. યુનિવર્સિટી સંલગ્ન કોલેજો દક્ષિણ ગુજરાત વિસ્તારના સુરત, ભરૂચ, ડાંગ, નર્મદા, નવસારી, તાપી, વલસાડ જિલ્લામાં તેમજ સંઘ પ્રદેશમાં આવેલી છે. કેટલીક કોલેજો ગ્રામીણ વિભાગના ખૂબજ અંતરિયાળ વિસ્તારોમાં છે. જ્યાં યુનિવર્સિટી દ્વારા પ્રસ્તુત કામગીરી માટે વાહનો મોડી સાંજે પહોંચતા કોલેજો બંધ થઈ જતા યુનિવર્સિટીના અધિકૃત કર્મચારી દ્વારા જવાબદારી પૂર્ણ કરી યુનિવર્સિટી ખાતે મોડી રાત્રે પરત આવતા હોય છે. જે અવલોકને લેતાં, યુનિવર્સિટી સંલગ્ન કોલેજો ખાતે પરીક્ષાને લગતું સાહિત્ય, પેપર, માર્કશીટ મોકલવા તેમજ ઉત્તરવહીનું કલેક્શન તથા પહોંચાડવા જેવી અત્યંત સમય મર્યાદાની કામગીરી માટે જિલ્લા વાઈઝ સબ સેન્ટર નિયુક્ત કરવા અંગે વિચારણા કરવા બાબત.

(પરીક્ષા વિભાગ / મૂલ્યાંકન ભવન)

(૬) અધ્યક્ષશ્રીની મંજૂરીથી જે બાબત રજૂ થાય તે.

ક્રમાંક : એ/એ.કા./કા.સૂ./૧૨૫૭૫/૨૦૨૧

તા. ૨૧/૦૮/૨૦૨૧

સહી/—  
ઈ.ચા. કુલસચિવ

પ્રતિ,

એકેડેમિક કાઉન્સિલના સર્વે સભ્યશ્રીઓ....



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ડૉ.એ. જે.રાજ્યગુરુ

વિભાગીય વડા

આંકડાશાસ્ત્ર વિભાગ

પ્રતિ,

ડૉ.કપિલા મનોજ,

ડીન શ્રી,

વિજ્ઞાન વિદ્યાશાખા

વી.ન.દ.ગુ.યુનિવર્સિટી

સુરત.

ક્રમાંક: આંકડા/ Applied Stat/16(A)/૪૨૦૫/૨૦૨૧

તા.૧૯/૦૮/૨૦૨૧

અધિકૃત કાઉન્સિલ ના ૨૩/૦૮/૨૦૨૧

બંધ ૨ નિપ્રકાશિત ૨

**વિષય: Applied Statistics વિષય આપણી યુનિવર્સિટીના નવા statue /ordinance માં સામેલ કરી સુધારો કરવા બાબત..**

**સંદર્ભ: નવા બનેલ statue /ordinance..**

માનનીય ડીનશ્રી,

જેમ Physics અને Applied Physics તથા Mathematics અને Applied Mathematics વિષયો નવા Statue/ordinanceમાં સામેલ છે, તેજ પ્રમાણે તા.૧૯/૦૮/૨૦૨૧ ના રોજ મળેલ ની મીટીંગમાં થયેલ ચર્ચા મુજબ,આપણી યુનિવર્સિટીના હાલના Statue /ordinanceમાં Applied Statistics વિષય ઉમેરવા અંગે યોગ્ય કાર્યવાહી આગળ કરશોજી. ઉલ્લેખનીય છે કે આપણી યુનિવર્સિટીમાં,

- 1) M.Sc. (Applied Statistics) – વર્ષ ૨૦૦૭-૨૦૦૮ થી
- 2) M.hil. (Applied Statistics) – વર્ષ ૨૦૧૨-૨૦૧૩ થી
- 3) Ph.D.(Applied Statistics) – વર્ષ ૨૦૧૩-૨૦૧૪ થી અમલમાં છે./ ચાલે છે.

આ બાબતે સત્વરે યોગ્ય કરવા વિનંતી. જેથી વર્ષ ૨૦૨૧-૨૨ના શૈક્ષણિક વર્ષના પ્રવેશમાં કોઈ મુશ્કેલી ન આવે .

આપશ્રીને વિનંતી કે તરતની આગામી એકેડેમીક કાઉન્સિલની મીટીંગમાં આ બાબત રજુ થઈ જાય તો સારું.

આપના સહકારની અપેક્ષા સહ,

*Rajyaguru*

(એ. જે. રાજ્યગુરુ)

વિદ્યાગુણવર્ષ 12-13 અને 13-14 ના શિક્ષક પ્રવેશક પ્રાંચી.

૨) પ્રાંચી તા.૨૩/૦૮/૨૦૨૧ નો પત્ર ક્રમાંક: ૩૫૫/૦-૧૦૪/૨૦૨૧/૨૦૨૧

**PROF. & HEAD**  
Department of Statistics  
Veer Narmad South Gujarat University  
Surat-395007

P.T.O.  
19/8/21  
21/8/2021

અભિપ્રાય:

શાંકડાશાસ્ત્ર વિભાગના વડાશ્રીના  
 પત્ર અનુસાર નીચેના વિષયમાં H.Sc  
 (2009-૧૦થી) M.Phil (2012-13થી) અને  
 Ph.D (2013-14થી) Applied Statistics  
 વિષય ભણાવવામાં આવે છે અને તેમાં  
 સંશોધન શાય છે. કોઈ કોર્સ  
 Ordinance માં તેના સમાવેશ થયા નથી.  
 પરંતુ હાલમાં વિદ્યાર્થીઓએ applied  
 Statistics માં Ph.D. entrance આપેલ  
 અને પાસ થઈ pre. Ph.D. registration  
 course work ભરી રહ્યાં છે. આ  
 સારી બુનગાળમાં આ વિષય ભણાવવામાં  
 આવતો હોય તેના પુરાવા સામેલ છે.  
 વિમારણ બાબત આ પત્ર ના-23/૧/2021  
 ના ત્રીજા મળનાર A.C. માં બાબત મૂકવા  
 બલામળ સુધી.

1/11/2021

PROF & HEAD  
 DEPARTMENT OF STATISTICS  
 UNIVERSITY OF GUJARAT  
 AHMEDABAD



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 યુનિવર્સિટી કેમ્પસ, ઉદ્દના-મગદલ્લા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

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ડૉ.એ. જે.રાજ્યગુરુ  
 વિભાગીય વડા  
 આંકડાશાસ્ત્ર વિભાગ  
 પ્રતિ,  
 ડૉ.કપિલા મનોજ,  
 ડીન શ્રી,  
 વિજ્ઞાન વિદ્યાશાખા  
 વી.ન.દ.ગુ.યુનિવર્સિટી  
 સુરત.

ક્રમાંક: આંકડા/Applied Stat/16(A)/૨૦૫/૨૦૨૧  
 તા.૧૯/૦૮/૨૦૨૧

વિષય: Applied Statistics વિષય આપણી યુનિવર્સિટીના નવા statue /ordinance માં સામેલ કરી સુધારો કરવા બાબત..

સંદર્ભ: નવા બનેલ statue /ordinance..

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- 1) M.Sc. (Applied Statistics) – વર્ષ ૨૦૦૭-૨૦૦૮ થી
- 2) M.hil. (Applied Statistics) – વર્ષ ૨૦૧૨-૨૦૧૩ થી
- 3) Ph.D.(Applied Statistics) – વર્ષ ૨૦૧૩-૨૦૧૪ થી અમલમાં છે./ ચાલે છે.

આ બાબતે સત્વરે યોગ્ય કરવા વિનંતી. જેથી વર્ષ ૨૦૨૧-૨૨ના શૈક્ષણિક વર્ષના પ્રવેશમાં કોઈ મુશ્કેલી ન આવે .

આપશ્રીને વિનંતી કે તરતની આગામી એકેડેમીક કાઉન્સિલની મીટીંગમાં આ બાબત રજુ થઈ જાય તો સારું.

આપના સહકારની અપેક્ષા સહ,

*Rajyegunani*  
 (એ. જે. રાજ્યગુરુ)

વિષ્ણુગાંધીવર્ષ 12-13 અને 13-14 ના શાકીય અહેવાલમાંથી.

૨) માટે તા.૨૧/૦૮/૨૦૨૧ નો પત્ર ક્રમાંક: ૩૫૫/૦૧૦૪/૩૦૪૫/૨૦૨૧

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 Veer Narmad South Gujarat University  
 Surat-395007

આ બાબતે આરોગ્ય સંબંધિત શરતો સરકારી ઓફિસમાં રજીસ્ટર કરવામાં આવેલ છે. આ બાબતે આરોગ્ય સંબંધિત શરતો સરકારી ઓફિસમાં રજીસ્ટર કરવામાં આવેલ છે. આ બાબતે આરોગ્ય સંબંધિત શરતો સરકારી ઓફિસમાં રજીસ્ટર કરવામાં આવેલ છે.



**(16) Publication by faculty: (Dt. 01/04/2013 to Dt. 31/03/2014)****Dr. M.N.Gayakwad**

- (1) Entitled *Gujaratma Adivasi Vasti ane Vistaran* ISSN: 0975-637X published in National level in VNSGU Journal of Humanities & Social Sciences (A Biannual publication), Vol-4, Jul.-Dec 2013. pp. 66-85, Vol-4, Jul.-Dec 2013, pp. 66-85, 66, December 2014.
- (2) Entitled *Aadivasi samajama strino darjjo* ISSN: 0975-8046 published in Regional, Abhivvyakti, Abhivvyakti, Vol-12, page 8, Jul Aug 2013.
- (3) Entitled *Dangnni Adivasi Kheti ane Prashno* ISSN: 2250-1517 published in Regional level in Adilok, Vol-6, pp. 25-28, Nov-Dec-2013.
- (4) Entitled *Jal, Jangal, Jamin ane Aadivasio* ISSN: 2250-1517 published in Regional Level in Adilok, Vol-1, page 5, January- February 2014.

**(17) Infrastructure/ Equipment in the Department:**

Name Of Infrastructure	Quantity Of Infrastructure
Computer	34
LCD Projector	03
Photo Copier	01
Over Head Projector	01
Television	01
Refrigerator	01
Camera	02
Cooler	01

**DEPARTMENT OF STATISTICS**

From  
Annual  
Report -13-14

- (1) **Name of Department** : DEPARTMENT OF STATISTICS  
**Establishment Year** : 1970

**(2) Name of Head & Teachers along with Educational qualification:**

Name of Teacher	Designation	Highest Qualification
Dr. R. D. Patel	Professor & Head	M.Sc., Ph.D.
Dr. A. J. Rajyaguru	Professor	M.Sc., M.Phil., Ph.D.

**(3) Major research area/ activities of the Department:**

Sampling Theory  
 Statistical Inference  
 Applied Statistics  
 Operations Research  
 Medical Statistics

**(4) Courses offered by the Department:****4.1 Course:**

- (a) Degree : M.Sc. (Statistics), M.Phil. (Statistics),  
Ph.D. (Statistics),
- (b) ~~Self Finance~~ : M.Sc. (Applied Statistics) (Higher Payment),  
M.Phil (Applied Statistics)  
Ph.D. (Applied Statistics)

Handwritten text, possibly a signature or date, located on the left side of the page.

- (2) Participated & presented paper Gujarat na garo ma shikshan ni taraho ane prashno in Regional level Conference organized by School of Social Science, Central University of Gujarat Gandhinagar 19/ 2013

**Dr. M N Gayakwad**

Participated & presented paper Nature and importanse of tribal Panchyat in reference of Dang District in Regional level Conference organized by School of Social Science, Central University of Gujarat Gandhinagar 19/ 2013

- (15) **Publication by faculty: (Dt. 01/04/2012 to Dt. 31/03/2013)**

**Rekha N Mistry**

Entitled *Identification of the life skills programme for enhancing pedagogic achievements and career perception* published at International Level in Proceedings of the conference, 978-93-82062-80-6, 440, December 2013

**Dr. M N Gayakwad**

- (1) Entitled *Marriage system among the kokani tribe* published at Regional Level in Samajkaran, 3, 13, January 2013  
 (2) Entitled *Nature and importanse of tribal Panchyat in reference of Dang District* published at Regional Level in Adilok/2250-1517, 1, 30, Jan-Feb 2013

- (16) **Infrastructure/ Equipment in the Department:**

Name Of Infrastructure	Quantity Of Infrastructure
Computer	41 (35+06)
Lcd Projector	03
Photo Copier	01
Over Head Projector	01
Tv	01 Not Working
Refrigerator	01
Camera	02
Other	01 Cooler

## **DEPARTMENT OF STATISTICS**

From Annual Report- 12-13

- (1) **Name of Department** : DEPARTMENT OF STATISTICS  
**Establishment Year** : 1973

- (2) **Name of Head & Teachers along with Educational qualification:**

Name of Teacher	Designation	Highest Qualification
Dr. R. D. Patel	Professor & Head	M.Sc., Ph.D.
Dr. A. J. Rajyaguru	Associate Professor	M.Sc., M.Phil., Ph.D.

- (3) **Major research area/ activities of the Department:**

Sampling Theory  
 Statistical Inference  
 Applied Statistics  
 Operations Research  
 Medical Statistics

- (4) **Courses offered by the Department:**

**4.1 Course:**

- (a) Degree : M.Sc. (Statistics), M.Phil., Ph.D.  
 (b) Self Finance : M.Sc. (Applied Statistics) (Higher Payment), M.Phil.



**VEER NARMAD SOUTH GUJARAT UNIVERSITY**  
University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

**વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી**  
યુનિવર્સિટી કેમ્પસ, ઉદ્ધના-મગદલ્લા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

Tel : +91 - 261 - 2227141 to 2227146, Toll Free : 1800 2333 011, Fax : +91 - 261 - 2227312  
E-mail : info@vnsgu.ac.in, Website : www.vnsgu.ac.in

o/c  
9cb)

**URGENT-IMPORTANT**

Dr. A. J. Rajyaguru  
Prof. & Head  
Department of Statistics

No.: Stat./O-108/3084/2021  
Date: 2/7/2021

To,  
The I/c. Registrar  
V.N. S, G, Uni.,  
Surat

Attn.: PG section

Sub: Regarding correction in the Annexure-I of Ph.D. ordinance 108

Ref.: Your notification No.: PG/Ph.D./5366/2021 dated 1614/2021

Dear Sir,

With reference to above cited subject and reference, I am to draw your attention that in the Annexure-I of Ph.D. ordinance 108, on its page no.:10, under the list of "Faculty wise Research Advisory committees", by an overlook, the office missed to mention "Applied Statistics" subject in the column of "Subject of Group of Subject" for science faculty, RAC of Statistics. Needless to say that, our university is already awarding Ph.D. degree in the subject of Applied Statistics under the faculty of Science.

Kindly do the needful for the correction at earliest possible, as the RAC is to meet for Ph.D. proposal presentations and admissions for the academic year 2021-2022, on 6-7-2021 at 2.00 pm.

Expecting your kind cooperation for the said mater,

With kind regards,

Thanking you,

*A. J. Rajyaguru*

Yours sincerely,

**PROF. & HEAD**

Department of Statistics  
Veer Narmad South Gujarat University  
Surat-395007

(16) **Publication by faculty: (Dt. 01/04/2013 to Dt. 31/03/2014)**  
**Dr. M.N.Gayakwad**

- (1) Entitled *Gujaratma Adivasi Vasti ane Vistaran* ISSN: 0975-637X published level in VNSGU Journal of Humanities & Social Sciences (A Biannual P Vol-4, Jul.-Dec 2013. pp. 66-85, Vol-4, Jul.-Dec 2013, pp. 66-85, 66, Decemb
- (2) Entitled *Aadivasi samajama strino darijo* ISSN: 0975-8046 published in Abhivyakti, Abhivyakti, Vol-12, page 8, Jul Aug 2013.
- (3) Entitled *Dangnni Adivasi Kheti ane Prashno* ISSN: 2250-1517 published in Reg in Adilok, Vol-6, pp. 25-28, Nov-Dec-2013.
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(17) **Infrastructure/ Equipment in the Department:**

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Over Head Projector	01
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Refrigerator	01
Camera	02
Cooler	01

## DEPARTMENT OF STATISTICS

From  
Annual  
Report -15

- (1) **Name of Department** : DEPARTMENT OF STATISTICS  
**Establishment Year** : 1970

(2) **Name of Head & Teachers along with Educational qualification:**

Name of Teacher	Designation	Highest Qualification
Dr. R. D. Patel	Professor & Head	M.Sc., Ph.D.
Dr. A. J. Rajyaguru	Professor	M.Sc., M.Phil., Ph.D.

(3) **Major research area/ activities of the Department:**

Sampling Theory  
 Statistical Inference  
 Applied Statistics  
 Operations Research  
 Medical Statistics

(4) **Courses offered by the Department:**

4.1 **Course:**

(a) Degree

(b) Self Finance

M.Sc. (Statistics), M.Phil. (Statistics),  
 Ph.D. (Statistics),

M.Sc. (Applied Statistics) (Higher Payment),  
 M.Phil (Applied Statistics)  
 Ph.D. (Applied Statistics)

- (2) Participated & presented paper Gujarat na garo ma shikshan ni taraho ane prashno in Regional level Conference organized by School of Social Science, Central University of Gujarat Gandhinagar 19/ 2013

Dr. M N Gayakwad

Participated & presented paper Nature and importanse of tribal Panchyat in reference of Dang District in Regional level Conference organized by School of Social Science, Central University of Gujarat Gandhinagar 19/ 2013

- (15) Publication by faculty: (Dt. 01/04/2012 to Dt. 31/03/2013)

Rekha N Mistry

Entitled *Identification of the life skills programme for enhancing pedagogic achievements and career perception* published at International Level in Proceedings of the conference, 978-93-82062-80-6, 440, December 2013

Dr. M N Gayakwad

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Tv	01 Not Working
Refrigerator	01
Camera	02
Other	01 Cooler

## DEPARTMENT OF STATISTICS

From Annual Report-12-13

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Establishment Year : 1973

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Dr. A. J. Rajyaguru	Associate Professor	M.Sc., M.Phil., Ph.D.

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Statistical Inference  
Applied Statistics  
Operations Research  
Medical Statistics

- (4) Courses offered by the Department:

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(b) Self Finance : M.Sc. (Applied Statistics) (Higher Payment), M.Phil.



VEER NARMAD SOUTH GUJARAT UNIVERSITY  
University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી  
યુનિવર્સિટી કેમ્પસ, ઉદ્ધના-મગદલા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

Tel : +91 - 261 - 2227141 to 2227146, Toll Free : 1800 2333 011, Fax : +91 - 261 - 2227312  
E-mail : info@vnsgu.ac.in, Website : www.vnsgu.ac.in

o/c  
906)

**URGENT-IMPORTANT**

Dr. A. J. Rajyaguru  
Prof. & Head  
Department of Statistics

No.: Stat./O-108/3084/2021  
Date: 2/7/2021

To,  
The I/c. Registrar  
V.N. S, G, Uni.,  
Surat

Attn.: PG section

Sub: Regarding correction in the Annexure-I of Ph.D. ordinance 108

Ref.: Your notification No.: PG/Ph.D./5366/2021 dated 1614/2021

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Kindly do the needful for the correction at earliest possible, as the RAC is to meet for Ph.D. proposal presentations and admissions for the academic year 2021-2022, on 6-7-2021 at 2.00 pm.

Expecting your kind cooperation for the said mater,

With kind regards,

Thanking you,

*Rajyaguru*

Yours sincerely,

PROF. & HEAD

Department of Statistics  
Veer Narmad South Gujarat University  
Surat-395007



B++ NAAC Accredited University

VNSGU

VEER NARMAD  
SOUTH GUJARAT  
UNIVERSITY, SURAT

Udhna-Magdalla Road, SURAT - 395 007 (Gujarat) India  
Tel : +91-261-2227141 to 46, Fax : +91-261-2227312

Date of Registration

No: 405

26/8/2014

*Certificate of Registration for M.Phil*

CERTIFIED that THAKAR  
SOCI BHARAT KUMAR  
has registered her self as Post - Graduate  
student of the University working for the Degree  
of M.Phil in APPLIED STATISTICS and  
intends to appear in 2014-15

Surat 16.11.2015

Utkarmit  
For, University Registrar



Re-Accredited by NAAC with 'A' Grade

**VEER NARMAD SOUTH GUJARAT UNIVERSITY**

University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

**વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી**

યુનિવર્સિટી કેમ્પસ, ઉધના-મગદલા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

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E-mail : info@vnsgu.ac.in, Website : www.vnsgu.ac.in

906)

**Certificate of Adherence to UGC  
(Minimum Standard for award of Ph.D. Degree) 2009**

This is to certify that **Dr. Shingala Mital Chandubhai's** Ph.D. degree is in accordance with UGC (Minimum Standard for award of Ph.D. Degree) 2009. She fulfilled the below mentioned criteria. This Certificate has been given as per the resolution No. 32 of Academic Council dated 30-09-2013 & Syndicate resolution No. 80 dated 25-6-2014.

Name of Candidate	<b>Dr. Shingala Mital Chandubhai</b>
Name of the Subject / Faculty	<b>Applied Statistics / Science</b>
Title of Ph.D. Thesis	<b>COMPARISON OF DIFFERENT POST HOC TESTS</b>
Name of Guide	<b>Dr. Arti J. Rajyaguru</b>
Notification No. & Date	<b>1977/ Dt. 8-03-2017</b>
Year of Award of Ph.D. Degree	<b>2017</b>

\* This certificate is issued based on the following criteria being fulfilled by the candidate

	Criteria	Criteria fulfilled
		YES / NO
1	Admission by entrance test or interview/Presentation or both	YES
2	Maximum numbers, M.Phil.:5, Ph.D.:8/Supervisor	YES
3	<b>Reservation Policy</b>	YES
4	Course work/Research Methodology Theory	YES
5	Research Advisory committee-Review or Progress	YES
6	Part-1 Methodology Exam	YES
7	Pre Ph.D. Presentation <b>before thesis submissions</b>	YES
8	Publication of at least <b>01 paper</b> in refereed journal	YES
9	Presentation of <b>02 paper</b> in conference or seminar	YES
10	Evaluation of Thesis by two experts other than supervisor, <b>one out of State</b>	YES
11	Submission <b>Soft copy</b> of Thesis at the University	YES
<b>Total Criteria Being Fulfilled</b>		<b>11. (ELEVEN)</b>

- As per the report of her Guide & Dean.

No.PG/Ph.D./6111/2017  
Dt.12/04/2017



  
For I/c REGISTRAR

We, the Chancellor, Vice Chancellor and Members of the Senate of the Veer Narmad South Gujarat University

*mital*

certify that the withinsigned

having been found duly qualified for the degree of Doctor of Philosophy in March-2017.

the degree of

# Doctor of Philosophy

[ Applied Statistics ]

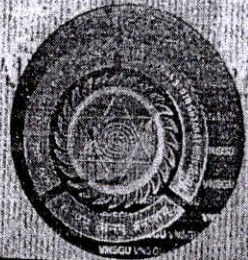
under the Faculty of Science has been conferred on

Shingala Mital Chandubhai

on the Twenty Fourth day of the month of August in the Year Four Thousand Seventeen

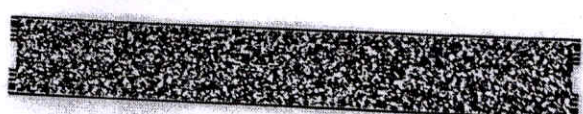
at Surat

In Testimony whereof are set the Seal of the said University and the Signature of the said Vice - Chancellor.



*Handwritten signature*

Vice - Chancellor.  
(On - Charge)





**VEER NARMAD SOUTH GUJARAT UNIVERSITY**  
University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

**વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી**  
યુનિવર્સિટી કેમ્પસ, ઉદ્ધના-મગદલ્લા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

Telegram : VNNGU, Telephone : +91 - 261 - 2227141 to 2227146, Fax : +91 - 261 - 2227312  
E-mail : info@vnsgu.ac.in, Website : www.vnsgu.ac.in

**Ph.D. NOTIFICATION NO. : 1977**

It is hereby notified that on recommendation of the Board of Examiners appointed to adjudicate on the Thesis submitted by the following candidate, the **VICE-CHANCELLOR** of this University has accepted the reports (assessment and viva-voce) of the Board of Examiners and declared her eligible for the award of Degree of **DOCTOR OF PHILOSOPHY (Ph.D.)** in the **SUBJECT of APPLIED STATISTICS, FACULTY of SCIENCE** with the topic of **COMPARISON OF DIFFERENT POST HOC TESTS**

Name of the Candidate	Photo of Candidate	Ph.D. Regi. No. & Date	Name of the Supervising Teacher	Photo of the Supervising Teacher
SHINGALA MITAL CHANDUBHAI		<u>3181</u> 21-06-2013	Dr. Arti J. Rajyaguru, Professor, Department of Statistics, Veer Narmad South Gujarat University, Surat.	

No : PG /Ph.D./3998/2017

Dt. 8<sup>th</sup> March, 2017.

Office of the  
Veer Narmad South Gujarat University,  
SURAT

I/C REGISTRAR

Candidate concerned.

**Copy forwarded with compliments to :**

- (1) Supervising Teacher concerned.
- (2) The Controller of Exam, Examination Section.
- (3) The Registrars of all Statutory Universities in Gujarat State.
- (4) The Secretary, University Grants Commission, Bahadur Shah Zafar Marg, New Delhi.
- (5) Principals of all affiliated Colleges.
- (6) The Dean of the Faculty concerned.
- (7) I/c. Librarian, Central Library, Veer Narmad South Gujarat University, Surat.
- (8) The Editor, University News, (A I U ), 16, Comrade Indrajit Gupta Marg (Kotla Marg), New Delhi -110002.

# VEER NARMAD SOUTH GUJARAT UNIVERSITY



SURAT - 395 007  
(Re-Accredited 'B' 2.82 CGPA by NAAC)  
STATEMENT OF MARKS

Sr. No.2014 :  
5402475

Certificate showing the number of marks obtained by  
Shri/Smt./Kumari **SHINGALA MITAL CHANDUBHAI**  
In each head of passing at the PH.D. ( APPLIED STATISTICS ) COURSE WORK held in MAY - 2014

141378041

Seat No. : 000002

Subject Name	Passing Marks		Marks Obtained			Remarks
	External	Internal	External	Internal	Total	
RESEARCH METHODOLOGY	50	50	36	27	63	C
ADVANCED SURVEY SAMPLING	50	50	37	39	76	B
ADVANCED OPERATIONS RESEARCH	50	50	38	45	83	A
<b>Aggregate Total</b>	<b>150</b>	<b>300</b>	<b>111</b>	<b>222</b>		<b>FIRST DIST.</b>

O-10 Outstanding (90% - 89%) - Distinction  
A-8 Excellent (80% - 85%) Distinction  
B-8 Very Good (70% - 79%) Distinction  
C-7 Good (60% - 69%) First Class  
D-6 Fair (50% - 59%) Second Class  
E-5 Dropped (40% - 49%) Fail  
F-4 Dropped (Below 50%) Fail

\* As per Rule 87A/B  
— Indicates Failure  
AB Indicates Absent  
ZR Indicates Zero  
Gr. Grade  
Gp. Grade Point

Percentage (%) = (Obtained GPA/100) \* 100

SURAT - 395 007  
Issue Date : 09 September 2014

Note : 1) No change in any entry is to be made except by the authority issuing the certificate. Any infringement will be severely dealt with.  
2) GPA is based on Total Marks Only.

I certify that Shri/Smt./Kumari **SHINGALA MITAL CHANDUBHAI** has appeared at PH.D. ( APPLIED STATISTICS ) COURSE WORK examination held by the VEER NARMAD SOUTH GUJARAT UNIVERSITY, SURAT. His/Her seat no. Month and Year of Examination and Class Obtained mentioned below :  
Month and Year of Examination : MAY 2014  
Class Obtained : **FIRST DIST.**  
GPA : **8.00/10.00**



*Registrar's Signature*  
REGISTRAR

VEER NARMAD  
SOUTH GUJARAT UNIVERSITY

Date of Registration  
21/06/2013

No. 3181

CERTIFICATE OF REGISTRATION FOR Ph. D.

CERTIFIED that Shingale  
Mital Chendubhai

has registered her self as a postgraduate student  
of the University working for the Degree of Ph. D.  
in Statistics (Applied Statistics) and intending  
to appear in \_\_\_\_\_

urat 28/11/ 2013

V. S. Wani  
For University Registrar

... been allotted



Re-Accredited 'B' 2.82 CGPA by NAAC  
**VEER NARMAD SOUTH GUJARAT UNIVERSITY**

University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી

યુનિવર્સિટી કંપસ, ઉદ્ધના-મગદલા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

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E-mail : info@vnsqu.ac.in, Website : www.vnsqu.ac.in

No. PG/Ph.D./REGN/6808/2013.

Dt. 20-06-2013

To,

Shingala Mital Chandubhai  
B-70, Ashwin Society-3,  
Near Khodiyar Nagar,  
A. K. Road,  
Surat-395 008.

Sub : Regarding Registration for Ph.D. Degree in the Subject of Statistics(Applied Statistics).

Gentlemen / Madam,

With reference to your application for the Ph.D. Degree, I am directed to inform you that on remitting the fees as under you will be registered for the Ph.D. Degree under the Faculty of Science in the subject of **Statistics(Applied Statistics)** with the topic "**A Comparision of Different Post HOC Test**" under the guidance of **Dr. A.J.Rajyaguru**.

As per rules, you are now required to remit the following Tuition / other fees in cash at the Cash Counter of the Accounts Section between 11-00 a. . to 2-00 p.m. on working days, after getting your Registration from dully checked by the Post Graduate Section of the University office :

<u>Sr. No</u>	<u>Details</u>	<u>(Amount) Rs.</u>
(1)	Registration Fee ( Date of Admission)	100/-
(2)	University Campus Devp. Fee	50/-
(3)	University Spots & Cultureal Activities	20/-
(4)	University Sports Complex Devp. Fee	20/-
(5)	Tuition Fee	2000/-
(6)	Laboratory Fee	1500/-
(7)	Admission Fee ( Date of Admission)	50/-
(8)	Identity Card ( Date of Admission)	50/-
(9)	Library Deposit ( Date of Admission)	200/-
(10)	College Deposit ( Date of Admission)	100/-
(11)	Student & Teacher Welfare	150/-
(12)	Books, Equipments etc..	250/-
(13)	Student Union	100/-
(14)	Amenities Fee	150/-
(15)	Campus Development Fee	100/-
(16)	Internal Examination	75/-

- 2 -



Accredited 'B' 2.82 C.A. by NAAC

VEER NARMAD SOUTH GUJARAT UNIVERSITY

University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી

યુનિવર્સિટી કંપસ, ઉદ્ધના-મગદલા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

Telegram : VNSGU, Telephone : +91 - 261 - 2227141 to 2227146, Fax : +91 - 261 - 2227312  
E-mail : info@vnsgu.ac.in, Website : www.vnsgu.ac.in

No. PG/Ph.D./Regis.Certi./13906/2013

Dt.28/11/2013

To,  
Shingale Mital Chandubhai  
B-70, Ashwin Society-3,  
New Khodiyas Nagar,  
A. K. Road  
Surat-395.008.

Sub: Registration for Ph.D. Degree in the Subject of Statistics (Applied Statistics)

With reference to your application for registration as a Post Graduate student for Ph.D. Degree Course, I am to inform you that you have been registered for the Ph.D. Degree in the subject of Statistics (Applied Statistics). Your Topic of the Subject and Name of the Guide is mentioned in Admission Letter sent Vide our Letter No. PG/Ph.D./REGN/T.F./6808/2013, Dt. 20/08/2013. You have paid registration and other fees on 21/06/2013 and have been allotted Registration No. 3181 which Certificate is attached herewith.

You will be required to remit the tuition fees and other fees term - wise (Six months period) regularly for the prescribed term to the University Office (Cash Counter, Account Section, Veer Narmad South Gujarat University, Surat between 11 a.m. to 4 p.m.) up to the date of submission of your Synopsis for the Ph.D. Degree. If you fail to pay mentioned fees in the admission Letter in time you will be charged Late fee @ Rs. 20/- per day for the period of delay Payment of fees as per Ord. 128. Female student is Exempted for the tuition fees up to 4 (four) terms from the date of Registration.

As per the Provision of Ph.D. Ordinance the student may have submit his/her Ph.D. Thesis within six (6) years after the date of Registration.

I am also to inform you that after the registration of 4 years you have to apply for year to year Extension up to 2 (two) years.

Please note that the following instruction are to be strictly followed within the period. If you fail to do the same your admission will be cancelled and no fees shall be returned.

1. It may be noted that, as per rules, You will be required to submit precise title of your Ph.D. Thesis up to the Submission of Synopsis.
2. If You are a student from other University, you will have to obtain Final Eligibility Certificate from Veer Narmad South Gujarat University within six months from date of Registration.
3. I have to request you to Submit the Details of Registration No. & Date in the Department/College/Institution where your guide is working.

Encl. : As above.

*U. Amit*  
FOR REGISTRAR



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**VEER NARMAD SOUTH GUJARAT UNIVERSITY**

University Campus, Udhna-Magdalla Road, SURAT - 395 007, Gujarat, India.

**વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી**

યુનિવર્સિટી કેમ્પસ, ઉદના-મગદલા રોડ, સુરત - ૩૯૫ ૦૦૭, ગુજરાત, ભારત.

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આગળ  
૨૪/૨૦૧૫  
પાદ્ય  
જુઓ

**-: કાર્યવાહી :-**

આંકડાશાસ્ત્ર વિષયની અભ્યાસસમિતિની સભા મંગળવાર, તા. ૦૭-૦૭-૨૦૧૫ ના રોજ સવારે ૧૧.૦૦ કલાકે યુનિવર્સિટી કાર્યાલયના વહીવટી મકાનના રૂમ નં. ૧૦૪ માં નીચેના કામો માટે મળી હતી, જેમાં સભ્યોની હાજરી નીચે મુજબ હતી.

૧) ડૉ. રમણભાઈ ડી. પટેલ (અધ્યક્ષ)	હાજર
૨) પ્રો. અજીતકુમાર એન. નાયક	ગેરહાજર
૩) ડૉ. જનકરાય જે. દેસાઈ	હાજર
૪) ડૉ. અશોક એમ. દેસાઈ	ગેરહાજર
૫) પ્રો. રમેશભાઈ પી. પટેલ	હાજર
૬) પ્રો. હર્ષદ કે. શાહ	હાજર
૭) પ્રો. એમ. ડી. પટેલ	હાજર
૮) પ્રો. રાણા જયંતીલાલ ત્રિવેદી	ગેરહાજર
૯) ડૉ. હર્ષદ એમ. ટંડેલ	હાજર
૧૦) પ્રો. અરૂણકુમાર સિંઘ	હાજર
૧૧) ડૉ. સવિતા સોઠી	હાજર
૧૨) પ્રો. અશોક ચિત્રોડા	ગેરહાજર
૧૩) પ્રો. નેહા ઉપાધ્યાય	ગેરહાજર
૧૪) પ્રો. મનોજકુમાર આર. દેસાઈ	હાજર
૧૫) પ્રો. ઈશ્વરભાઈ કે. પટેલ	હાજર
૧૬) ડૉ. કલ્પેશકુમાર એસ. ટેલર	હાજર
૧૭) ડૉ. બાદલકુમાર પી. મહેતા	હાજર
૧૮) પ્રો. સંજય ડી. પટેલ	હાજર
૧૯) પ્રો. શહેનાઝ પ્રવિણ શેખ	હાજર
૨૦) પ્રો. બંટી કે. શાહ	હાજર
૨૧) ડૉ. વી. ડી. નાયક	ગેરહાજર
૨૨) ડૉ. જે. એમ. દેસાઈ	હાજર
૨૩) ડૉ. એમ. એન. પટેલ	ગેરહાજર

(૧) આંકડાશાસ્ત્ર વિષયની અભ્યાસસમિતિની અગાઉની સભાની કાર્યવાહીની નોંધને બહાલી આપવા બાબત.

:: આથી ઠરાવવામાં આવે છે કે, આંકડાશાસ્ત્ર વિષયની અભ્યાસસમિતિની તા. ૨૩-૦૨-૨૦૧૫ ની સભાની કાર્યવાહીની નોંધને બહાલી આપવામાં આવી હતી, ત્યારબાદ અધ્યક્ષશ્રીએ તેના પર સહી કરી હતી.

(૨) શૈક્ષણિક વર્ષ ૨૦૧૬-૧૭ થી અમલમાં આવનાર ટી.વાય.બી.એસસી. (આંકડાશાસ્ત્ર) વિષયના અભ્યાસક્રમ બાબત.

:: આથી ઠરાવવામાં આવે છે કે, શૈક્ષણિક વર્ષ ૨૦૧૫-૧૬ થી અમલમાં આવનાર ચોઈસ બેઈઝ ક્રેડિટ સીસ્ટમ (સીબીસીએસ) પ્રમાણે ટી.વાય. (બી.એસસી.) ના સેમીસ્ટરવાઈઝ અભ્યાસક્રમો તૈયાર કરવા અંગે નીચે જણાવ્યા પ્રમાણેની કમિટી બનાવવામાં આવે છે.

- ૧) પ્રો. એમ. ડી. પટેલ
- ૨) શ્રીમતી બી. ટી. નાયક
- ૩) પ્રો. જે. એમ. દેસાઈ

(૩) એસ.વાય.બી.એસસી. (આંકડાશાસ્ત્ર) સેમેસ્ટર-૩ નવેમ્બર ૨૦૧૫ ની પરીક્ષાની માર્કિંગ સ્કીમ બાબત.

આથી ઠરાવવામાં આવે છે કે, એસ.વાય.બી.એસસી. (આંકડાશાસ્ત્ર) સેમેસ્ટર-૩ નવેમ્બર ૨૦૧૫ ની પરીક્ષાની માર્કિંગ સ્કીમ નીચે પ્રમાણે છે.

પેપર નં.	પ્રશ્નોની સંખ્યા	ગુણ	કુલ
૩૦૧	૧૦	૦૧	૧૦
૩૦૨	૧૦	૦૨	૨૦
૩૦૩	૦૫	૦૪	૨૦
			૫૦

(૪) શૈક્ષણિક વર્ષ ૨૦૧૫-૧૬ થી અમલમાં આવનાર એસ.વાય. બી.કોમ આંકડાશાસ્ત્ર (વાર્ષિક), એમ.કોમ. પાર્ટ - ૨ આંકડાશાસ્ત્ર (વાર્ષિક) તેમજ એસ.વાય.બી.એ. આંકડાશાસ્ત્ર (વાર્ષિક) ના અભ્યાસક્રમ બાબત.

આથી ઠરાવવામાં આવે છે કે, શૈક્ષણિક વર્ષ ૨૦૧૫-૧૬ થી અમલમાં આવનાર એસ.વાય.બી.કોમ. (આંકડાશાસ્ત્ર) (વાર્ષિક), એમ.કોમ. પાર્ટ-૨ (આંકડાશાસ્ત્ર) (વાર્ષિક) તેમજ એસ.વાય.બી.એ. (આંકડાશાસ્ત્ર) (વાર્ષિક) નો અભ્યાસક્રમ આ સાથે સામેલ છે.

અધ્યક્ષસ્થાનેથી રજૂ થયેલ બાબત

(૫) M.Phil / Ph.D. (Applied Statistics) નો અભ્યાસક્રમ વર્ષ ૨૦૧૧-૧૨ થી અમલમાં આવ્યો હોય, M.Phil / Ph.D. (Applied Statistics) વિષયનો સ્ટેટ્યૂટ - ૧૦૬, ૧૨૦ અને ૨૨૯ માં આમે જ કરવા આંકડાશાસ્ત્ર વિષયની અભ્યાસસમિતિએ તેની તા. ૦૭/૦૭/૨૦૧૫ ની સભામાં વિજ્ઞાન વિદ્યાશાખાને ભલામણ કરે છે.

STATUTE - 106  
Faculty of Science  
M.Phil / Ph.D. (Applied Statistics)

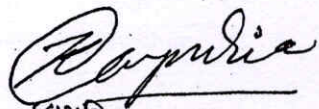
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M.Phil / Ph.D. (Applied Statistics)

STATUTE - 229  
Faculty of Science  
M.Phil / Ph.D. (Applied Statistics)

સહી/-  
અધ્યક્ષશ્રી  
આંકડાશાસ્ત્ર વિષયની અભ્યાસસમિતિ

વીર નર્મદ દક્ષિણ ગુજરાત યુનિવર્સિટી, સરત.

ક્રમાંક : એકે./આં.શા./કા.વા./૯૫૩૭/૧૫  
તા. ૧૩/૦૭/૨૦૧૫

  
કુલસચિવ

પ્રતિ,

આંકડાશાસ્ત્ર વિષયની અભ્યાસસમિતિના સર્વે સભ્યશ્રીઓ.

**Learning Outcomes Based Curriculum Framework  
(LOCF)  
for  
Defence and Strategic Studies (B.A. Defence Studies)  
  
Undergraduate Programme  
(2019)**



**UNIVERSITY GRANTS COMMISSION  
BAHADUR SHAH ZAFAR MARG  
NEW DELHI – 110 002  
2019**

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## PREAMBLE

LOCF in Defence and Strategic Studies is intended to provide a broad framework within which the discipline could respond to the changing needs of its various stakeholders in exclusivity in a more romanticized manner.

The template is an initiative of new kind and is expected to assist in the building and maintenance of under graduate Programme in Defence and Strategic Studies with innovative skill by holding a periodic review within a broad framework of an agreed structure as standard reference.

It is pertinent to mention that Defence & Strategic studies as a separate discipline is still underway to its final accomplishment vis a vis other established subjects/disciplines. This is notwithstanding, the other variants in which the discipline have not even acquired the status of a full degree programme, rather rests as part of or one of the elective subjects in the faculty of Arts, Humanities and Sciences.

There is strong plea to have a Bachelor's degree programme in Defence and Strategic Studies to brand it more sovereign in outlook.

Incredible, while security is a buzz word penetrating all pervasively at the, national and global level, the significance of this subject remains almost an amiss in country's scenario.

LOCF however, is a great strategic enterprise to this effect to build an architecture in not only reviewing the existing course curricula, but also endeavor to create a roadmap for its variants verticals - be the institutions serving the discipline; the faculty, the students or the societal environment providing a desired turf for a more meaningful dispensation in the long run.

A thought process has been generated to set and raise the standards in the subject shoving it at par with other academic programmes. For instance, a misperception gets created that the subject lacks employability avenues. Whereas given to its potential it has high value job creation credentials. But the general apathy in awareness and understanding towards security issues at institutional levels has been of great hindrance in the growth of this subject.

The LOCF provides a platform to look into certain progenial issues through obligatory sanctity attached to the development of this academic program which could best be cultivated.

There is a dire need to look holistically towards the subject to make it more attractive and relevant meaningfully. However, the question that does Defence Studies as an under graduate programme be put on ascending mode or the existing profile of the subject be strengthened to make it more marketably profitable for further inducement?

Defence and Strategic Studies as a subject demands specialized audience which currently dwells more on free for all. In the coming time, when specialization at micro level is the need of art, the subject too demands a favorable consideration and attention to contribute to the national potential. The thrust line is interest and passion which can extrapolate into various manifestations. It may be interesting to pen down the views of one of the student who said 'the subject gave me an opportunity to grow not only in many ways but each day also; grooming me to imbibe can do attitude'.

However, there is great need to showcase the subject in its own turf due to its multi - disciplinary spread into arts, science, management, sports, leadership strategy and defining of political behavior.

LOCF provides an opportunity to examine such various dimensions.

## 1. Introduction

LOCF indeed is a great initiative by the UGC to introduce improvement of quality in higher education.

1.1 The under graduate programme being a first dispensation in higher education is critical to the extent that it not only reserves certain transformation of mind from schoolite to a wider influence, but also at times repress or retard his/her thought process for the lack of desired input from authorities, peers or absence of common information loop. For instance, how much is known that IIT's, the premier institutions in India also run law faculty or LLM courses.

1.2 Taking recourse to the discipline of Defence and Strategic Studies there has been a general apathy towards the subject both at federal and state level despite certain recognizable traits attached to its significance. Like Defence and Strategic Studies as a subject has a global acclamation.

The security dimension has a unique dynamics – it starts with human security and goes unendingly to national and international level. Assessing human security stretches from personal security to the very basic need of societal obligations whereby security gambit is so essentially required. All developed countries have concerns for protective security whether it remains to nation's development capacity building or fostering relations with other countries for enhancing comprehensive national power signifying importance of security and its academic relationship. Defence /National Security Studies as a discipline has a wider connotation and even spread out to inter disciplinary subjects - be it Humanities, Languages, Science, Management, Governance and Leadership.

1.3 Security is a buzz word and needs to be understood in its entirety with strategic and non strategic overtones. Security is complimentary to the development of a nation while development processes in developing countries suffer due to incomprehension of security issues.

1.4 The subject of Defence / National Security Studies therefore holds unique significance and demand security consciousness in society in which academics have a wider role to play. LOCF definitely is a moderate attempt in this regard to introspect the causes and reasons of rigidity and tepidity which revolves around the subject. However, there is a dire need of equipping our young academic community. For instance, at a foundation level there is a desire for any career launcher in academics to acquire overall knowledge, increase horizon including getting conversant with communication skills and teaching aids. Such an incremental course work is essential and may

be conceived for a period of at least five years until one is found eligible for next level. This may be considered as a basic step for the success of LOCF.

1.5 A student teacher relationship would ideally be suited if it involves lot of interaction demanding sustained efforts and unconventional experimentation. Unlike abroad, we have total emphasis on class room teaching and over the period it loses interests among students and teachers alike. There is a need to expose the students to the environment, encourage *avante-garde* or off beat eccentricism until remained barrack centric.

1.6 LOCF undertakes/suggest such extra ordinary outlandishness by inspiring not only transgression into other subjects of interests but also class outfield study behavior to make the students understand the domain eco system. In fact, the field studies also equips the students with all the attributes given in the conceptualization of LOCF and acquiring added contrivance or maturing them enough to be in a state of decision making in their future endeavor. Another deepening issue that despite so much of talks about promoting academic link with professional bodies such as industry, research centers, think tanks, the services and even the bureaucracy - the largely seen twin Siamese stays apart.

1.7 Academics can extend to such excellence of professional bodies – an opportunity for higher education and gaining specialization by undertaking research activities. In this context, the mandatory conditions warding off professionals to the academic programme may be dispensed with providing students a window for better synergy.

1.8 LOCF indeed is a sterling opportunity or a pathway in striking at any accustomed predictable.

## **2. Learning Outcomes Based Approach to Curriculum Planning for Defence and Strategic Studies (at Under Graduate level)**

2.1 It is said that there's nothing as practical as good theory. It may also be said that there's nothing as theoretically interesting as good practice. The fundamental premise underlying the learning outcomes based approach to curriculum planning is that the bachelor's degree programme in Defence and Strategic Studies shall be awarded on the basis of demonstrative achievements outcomes as:

- 2.1.1 Attainment of sound knowledge about the basics that the students is expected to imbibe in the subject.
- 2.1.2 Having a clear understanding of the key concepts related to the subject along with their applications in real life situations.
- 2.1.3 Development of analytical skills so as to be able to appreciate the importance of the subject and spread its awareness.
- 2.1.4 Inculcate a spirit of nationalism and develop good values contributing to building strong national character.

## **3. Nature and Extent of Bachelor's Degree Programme in Defence and Strategic Studies (Honours/Regular Course)**

3.1 Earlier known as Military Science, Military Studies or Defence Studies is a recognized degree in 'Defence and Strategic Studies' by the University Grants Commission, New Delhi at Undergraduate, Postgraduate, Doctorate and Post Doctoral level. However, the degree programme in Defence and Strategic Studies is only at few places while it exists as one of the elective subject in most of the places. The approach to the study in the discipline is interdisciplinary as the subject broadly covers military history, war, national security studies, international relations, peace and conflict studies, international terrorism, defence economics, military psychology/sociology and other aspects related to military or security of the nation and as such encompasses such aspects like geopolitics and military geography, science and technology, economics of defence, conflict management and conflict resolution, etc. The framework is intended to allow flexibility and innovation in programme design and syllabi development, teaching-learning process and assessment of student learning levels.

#### **4. Aims of the Bachelor's Degree in Defence and Strategic Studies (Honours/Regular Course)**

4.1 Defence and Strategic Studies as a subject and degree cover all strategic aspects that can have a bearing on the learning of security issues in the defence of the country. The overall objectives of bachelor's degree programme in Defence and Strategic Studies are to –

- 4.1.1 Formulate qualitative description combining domain knowledge with gains from choice based credit system enabling students to qualify for jobs even outside the discipline demonstrating mobility of service.
- 4.1.2 Instill the graduates skills, knowledge and abilities to understand national security issues analytically which to help the students to pick up adequate comprehension on matters security. Infuse each graduate with a desire to be a lifelong learner and plan to pursue professional courses related to Defence and Strategic Studies to be a domain specialist.
- 4.1.3 Imbue an appreciation of one's civic duties and responsibilities towards society and demonstrate knowledge of contemporary or emerging threats, challenges or issues thereby contributing to strategic culture.
- 4.1.4 Encourage leadership qualities amongst students and raise ability to work as a team.
- 4.1.5 Gain an understanding of professional ethics and to apply in the field of national security rather than replicate curriculum content knowledge
- 4.1.6 Demonstrate the ability to apply one's disciplinary knowledge and skills to new frontiers and be a partner ensuring global competitiveness.
- 4.1.7 Undertake mechanism to periodically review of teaching programmes including adoption of teaching learning techniques.

#### **5. Graduate Attributes in Defence and Strategic Studies (Honours/Regular Course)**

5.1 It has been generally observed that students at the time of joining graduate programme or at the end of such studies remain unclear and confused in deciding their future course of study. For instance, while course in Defence and Strategic Studies is always not an exclusive degree programme, but is served at post graduate level, students are generally oblivious of certain realities. However, having taken up the discipline in Defence and Strategic Studies at under graduate level, the student must reflect a sense of maturity, good attributes, values and skills

enabling him/her to decide further course of action in terms of should he/she go in for higher studies or having attained a particular skill take to the job and simultaneously pursue higher studies. Such an arrangement works abroad quite successfully and makes them more professional and responsible in their career pursuit. In addition, the attributes in a graduate of Defence and Strategic Studies are expected to exhibit the following:

- 5.1.1 **Disciplinary knowledge and skills:** Capable of demonstrating (i) comprehensive knowledge and understanding of major concepts, theoretical principles and contemporary strategic environment in Defence & Strategic Studies and its different subfields.
- 5.1.2 **Skilled communicator and Critical thinker:** Ability to transmit complex information and ability to employ critical thinking relating to national security issues in a clear and concise manner in writing and oral skills.
- 5.1.3 **Sense of inquiry:** Capability for asking relevant/appropriate questions relating to issues and problems in the field of Defence & Strategic Studies and planning, executing and reporting the results of any issues related to national/international security
- 5.1.4 **Team player/Leader:** Capable of working effectively in diverse teams in both classroom, in society and real life situations.
- 5.1.5 **Skilled project manager:** Capable of identifying/mobilizing appropriate resources required for a project, and manage a project through to completion, while observing responsible and ethical conduct.
- 5.1.6 **Digitally literate:** Capable of using computers to understand strategies and tactics in conflicts.
- 5.1.7 **Ethical awareness/reasoning:** Capable of embracing and demonstrating the ability to demonstrate moral/ ethical values in one's work and avoiding unethical behavior such as fabrication, falsification or misrepresentation of data or committing plagiarism, and appreciate environmental and sustainability issues.
- 5.1.8 **Lifelong learners:** Capable of self-paced and self-directed learning aimed at personal development and for improving knowledge/skill development and current affairs.

## **6. Qualification Descriptors for a Bachelor's Degree Programme in Defence and Strategic Studies (Honours/Regular Course)**

6.1 The qualification descriptors for a Bachelor's Degree programme in Defence and Strategic Studies shall include the following:

- 6.1.1 Demonstrate:- (i) Acquire a demonstrative ability towards systematic/coherent understanding in Defence and Strategic Studies, its different learning areas and areas of specializations, besides linkages with related disciplinary areas/subjects; (ii) Procedural knowledge and skills that creates different types of professionals related to national security issues, including research and development, teaching and government and public service;
- 6.1.2 Understanding national and international strategic and security issues, analyses and evaluation using methodologies as appropriate to the subject(s) for drawing interpretations and conclusions;
- 6.1.3 Communicate results of studies undertaken in security affairs in a range of different contexts using the concepts, constructs and techniques as applicable;
- 6.1.4 Able to draw on a range of current research and development work and professional materials;
- 6.1.5 Apply one's subject knowledge and transferable skills to new/unfamiliar contexts to identify and analyze different issues and analyse complex problems with well-defined suggestions for policy makers in national security issues.
- 6.1.6 Demonstrate subject-related contemporary strategic national and international issues and transferable skills that are relevant to Defence and Strategic Studies - related job trades and employment opportunities in the field of teaching, armed/paramilitary/security forces and journalism.

## **7. Programme Learning Outcomes relating to Bachelor's Degree Programme in Defence and Strategic Studies (Honours/Regular Course)**

- 7.1 Upon completion of the programme of Bachelor's in Defence and Strategic Studies, a student should have acquired basic competency in strategic affairs covering a wide spectrum of interstate security to global security issues including non kinetic dimensions.
- 7.2 Shall develop capability in understanding the implications of use and threat of use of force in International relations.
- 7.3 Shall seek, identify and apply the acquired knowledge in defence and strategic studies on contemporary issues of strategic relevance.
- 7.4 Ability to move from LOTS (Lower Order of Thinking Skills) to HOTS (Higher Order of Thinking Skills) in Defence and Strategic Studies.
- 7.5 The learning of strategic studies shall arm the candidates to independently choose further course of action in his/her life whether pursuing higher education by taking specialized course in honours or identifying a career for himself or herself.

**7.6 Course - Level Learning Outcomes** - Learning Outcomes-Based Curriculum Framework (LOCF) is an educational theory that bases each part of an educational system around goals (outcomes). By the end of the educational experience, each student should have achieved the goal. There is no single specified style of teaching or assessment in LOCF; instead, classes, opportunities, and assessments should all help students achieve the specified outcomes. The role of the faculty adapts into instructor, trainer, facilitator, and/or mentor based on the outcomes targeted.

**7.7 Some examples of course-level learning outcomes that a student of this course is required to demonstrate are indicated below:-**

### **7.7.1 Clarity**

The focus on outcomes creates a clear expectation of what needs to be accomplished by the end of the course. Students will understand what is expected of them and teachers will know what they need to teach during the course. Clarity is important over years of college and when team teaching is involved. Those designing and planning the curriculum are expected to work backwards once an outcome has been decided upon; they must determine what knowledge and skills will be required to reach the outcome.

### 7.7.2 Flexibility

With a clear sense of what needs to be accomplished, instructors will be able to structure their lessons around the student's needs. LOCF does not specify a specific method of instruction, leaving instructors free to teach their students using any method. Instructors will also be able to recognize diversity among students by using various teaching and assessment techniques during their class.

### 7.7.3 Comparison

LOCF is meant to be a student-centered learning model. The institutions can compare outcomes to determine what credits to award the student. A potential employer can look at records of the potential employee to determine what outcomes they have achieved. They can then determine if the potential employee has the skills necessary for the job.

### 7.7.4 Involvement

Student involvement in the classroom is a key part of LOCF. Students are expected to do their own learning, so that they gain a full understanding of the material. Increased student involvement allows students to feel responsible for their own learning, and they should learn more through this individual learning. Other aspects of involvement are parental and community, through developing curriculum, or making changes to it. Parents and community members are asked to give input in order to uphold the standards of education within a community and to ensure that students will be prepared for life after college.

### 7.7.5 Knowledge

Upon successful completion of this course, students will acquire an excellent knowledge of the biblical concepts taught in the epistle to the Colossians and will be familiar with major theological themes.

### 7.7.6 Skills

Upon successful completion of this course, students will be able to reflect critically on various New Testament theological themes and issues and their contemporary relevance.

## 7.8 Discipline Specific Elective (DSE) – Some examples of course-level learning outcomes that a student of this course is required to demonstrate are indicated below:-

7.8.1 Cyber risk is now firmly at the top of the international agenda as high-profile breaches raise fears that hack attacks and other security failures could endanger the global economy. The Global Risks 2015 report, published in January by the World

- Economic Forum (WEF), included this rather stark warning: "90 percent of companies worldwide recognize they are insufficiently prepared to protect themselves against [cyber attacks]." Therefore, The DSE paper 'Cyber Security' will help the students understand that how cyber security is emerging a major threat to national security of a nation.
- 7.8.2 Remote sensing is the acquisition of information about an object or phenomenon without making physical contact with the object and thus in contrast to on-site observation, especially the Earth. Remote sensing is used in numerous fields, including geography, land surveying and most Earth Science disciplines and also has military, intelligence, commercial, economic, planning, and humanitarian applications. The paper 'Remote Sensing and National Security' focuses on the national security issues in case of space war between nations.
- 7.8.3 The paper 'Legal Aspects of International Security' is based on the International Law related to war and conflicts. A core component of international law is the law governing the use of force between states and the rules governing the conduct of hostilities. The area encompasses questions such as permissible use of force under the U.N. Charter, the scope and application of the Geneva Conventions; issues relating to peacekeeping and stability operations, conflict resolution, and post-conflict reconstruction; and legal responses to contemporary challenges, such as failing and fragile states, the proliferation of weapons of mass destruction, transnational crime, and terrorism.
- 7.8.4 Terrorism is, in the broadest sense, the use of intentionally indiscriminate violence as a means to create terror among masses of people; or fear to achieve a religious or political aim. The increased use of suicide attacks from the 1980s onwards was typified by the September 11 attacks in New York City and Washington, D.C. in 2001. Therefore, This paper 'International Terrorism' will acquaint students how terrorism has become a global concern especially for India.
- 7.8.5 The emergence of a number of non-state actors, such as terrorist networks, drug cartels and maritime piracy networks, and intra-state conflicts (e.g. civil wars) have assumed importance as new-age threats to the national security of present-day states. So the need of the hour for the students of Defence and Strategic Studies disciplines

is to understand the emerging nontraditional threats to security in contemporary times.

7.8.6 The papers 'WMD, Nuclear Proliferation and National Security' and 'Defence Mechanism of Modern States' will be focusing on the risk of proliferation of nuclear weapons and how the defence mechanism require major changes in the war of 21<sup>st</sup> century. The majority of traditional concepts of war have become irrelevant and obsolete.

7.8.7 The paper 'Conflict Resolution and Peace Building' deals with various aspects of resolving conflicts and maintaining international peace and security. Various methods and techniques of conflict resolution and peace building will help them understanding the importance of peace. Besides, role of UN, NGO's and other agencies has also been included in this paper.

**7.9 Generic Elective (Interdisciplinary) – Some examples of course-level learning outcomes that a student of this course is required to demonstrate are indicated below:-**

7.9.1 The **choice based credit system** not only offers opportunities and avenues to learn core subjects but also explore additional avenues of learning beyond the core subjects for holistic development of an individual. Choice based credit system (CBCS), in the layman's terms, is where the students can choose the prescribed courses, as the core, and elective or soft skill courses, from a range of options, rather than to simply consume what the curriculum offers. Therefore, a student enrolled for B.A./B.A. (Hons) in Defence and Strategic Studies will have the advantage of reading some Generic Elective (interdisciplinary) subjects also.

7.9.2 The papers like 'General Economics' will introduce them with the general principles of economics whereas 'Military Sociology' not only acquaint them with the general sociology but also with sociological issues faced by the soldiers during the service as well after retirement and the problems of resettlement and rehabilitation after war. 'International Relations' as discussed above will enable them to understand the basic issues of IR in the contemporary times.

7.9.3 In this part 'Functional Research Methodology' will help them understand the basic concepts of research enabling them to do research at higher level later. The issues of

'Human Rights' have become so sensitive that various international Humanitarian Laws have been framed to protect the various basic human rights in all the countries. Examples of rights and freedoms which are often thought of as human rights include civil and political rights, such as the right to life, liberty, and property, freedom of expression, pursuit of happiness and equality before the law; and social, cultural and economic rights, including the right to participate in science and culture, the right to work, and the right to education.

7.9.4 The potential of the Media in Conflict and post-conflict situations remains a net positive, and has been sadly underutilized to this point in time. Media and journalism can be a great assistance in conflict management and peace building. However, the power they have is also limited, as they will never be able to eliminate armed conflicts altogether. The media can be a good tool in a healthy and functioning environment but more is needed than ethical and responsible reporting to ensure lasting peace and safety.

**7.10 Ability Enhancement Course/Skill Based Subjects (AEC)– Some examples of course-level learning outcomes that a student of this course is required to demonstrate are indicated below:-**

7.10.1 Journalism is the activity of gathering, assessing, creating, and presenting news and information. It is also the product of these activities. Journalism can be distinguished from other activities and products by certain identifiable characteristics and practices. Defence journalism, though very much a part of modern day journalism, has practically very little literature for reference. Being the first book on defence journalism, with special reference to India, it analyses the love-hate relationship between the military and the media.

7.10.2 Leadership starts at the top, with the character of the leader, with your character. In order to lead others, you must first make sure your own house is in order. Strategic leadership refers to a manager's potential to express a strategic vision for the organization, or a part of the organization, and to motivate and persuade others to acquire that vision. The first three principles of strategic leadership involve nontraditional but highly effective approaches to decision making, transparency, and innovation.

7.10.3 General Studies is one of the subjects which have major contribution in the whole civil services, state services and competitive examination. In the Prelims there is one whole Paper of General Studies and in the Mains it has its contribution. Though Optional subject also has its importance but at the same time General Studies has its own contribution. Combining with whole syllabi the ability enhancement paper 'General Studies/Current Affairs' will help students to be well informed and help them clear some doubts.

**7.11 Therefore, upon completion of the programme of Bachelor's in Defence and Strategic Studies:-**

- 7.11.1 A student should have acquired basic competency in strategic affairs covering a wide spectrum of interstate security to global security issues including non kinetic dimensions.
- 7.11.2 Shall develop capability in understanding the implications of use and threat of use of force in International relations.
- 7.11.3 Shall seek, identify and apply the acquired knowledge in defence and strategic studies on contemporary issues of strategic relevance.
- 7.11.4 Ability to move from LOTS (Lower Order of Thinking Skills) to HOTS (Higher Order of Thinking Skills) in Defence and Strategic Studies
- 7.11.5 The learning of strategic studies shall arm the candidates to independently choose further course of action in his/her life whether pursuing higher education by taking specialized course in honours or identifying a career for himself or herself.
- 7.11.6 The course curriculum in Defence and Strategic Studies is designed to encourage the acquisition of disciplinary/subject understanding, gain academic knowledge and professional skills required for any career pursuit be it choosing for higher studies or a job. The outcome based approach, particularly in the context of Defence and Strategic Studies for undergraduate programme will incorporate a significant shift from teachers centric to learner centric pedagogies and from specific to active/participatory pedagogies where emphasis will be on field Study, educational tours, writing assignments, seminar presentation and Tutorials etc. Teaching, therefore, becomes more interesting and absorbing aiming at demonstrative learning.

- 7.11.7 **Educational Tours** – The visit to Defence institutions or defence related historical locations like forts and other archeological sites will provide the students with a first-hand experience of the topics of study and emphasize their importance and significance to the present world. Ship visits and a visit to view armaments that are open to public viewing like museums etc will provide a closer look at weapons that were used over the years and give an idea of evolution of arms and warfare in general.
- 7.11.8 **Field Study** – Taking up a small project on a related topic that could include collection of data through surveys or interviews could enhance communication skills of the students and enable them to propose a study subject and produce a report based on the data collected. This will form a vital part of the skill acquisition to undertake further research.
- 7.11.9 **Writing Assignments**- Since Defence & Strategic Studies would also entail extensive writing ability, practical training in writing essays, reports and favoring or opposing an argument or thesis, students must continuously be subjected to assignment writing so that they are well versed with the nuances of writing for a variety of purposes.
- 7.11.10 **Seminar Presentation** – Conducting seminars where student choose specific topics on which they research and present to an audience forms a vital part of developing skills of communication as well as organizing thought in a logical and cohesive manner. Every course teacher can utilize this technique to evoke interest in students on a particular topic or approach the same topic from a multiplicity of approaches.

## 7.12 Course Map

Table 1														
Programme Outcomes	Core paper Courses													
	1	2	3	4	5	6	7	8	9	10	11	12	13	14
Basic competency	x	x	x	x	x	x	x	x	x	x	x	x	x	x
Understanding capability	x	x	x	x	x	x	x	x	x	x	x	x	x	x
Knowledge application						x		x	x	x	x	x	x	x
LOTS to HOTS						x		x	x		x		x	x
Career choice								x			x			

Table 1																	
Programme Outcomes	Discipline Specific Elective Courses								Generic Elective Courses						Ability enhancement courses		
	1	2	3	4	5	6	7	8	1	2	3	4	5	6	1	2	3
Basic competency	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	X
Understanding capability	x	x	x	X	x	x	x	x	x	x	x	x	x	x	x	x	X
Knowledge application	x	x	x	X	x	x	x	x				x	x	x	x	x	X
LOTS to HOTS	x	x	x					x				x				x	X
Career choice	x	x	x					x				x				x	X

## 8. Structure of Courses for Bachelor's Degree Programmes - B.A/B.Sc & B.A/B.Sc (Honours/ Regular) under Choice Based Credit System (CBCS)

COURSE	*CREDITS	
Theory & Practical	Theory & Tutorial	

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### I. Core Course (6 Credits)

(14 Papers)  $14 \times 4 = 56$   $14 \times 5 = 70$

#### Core Course Practical / Tutorial\*

(14 Papers)  $14 \times 2 = 28$   $14 \times 1 = 14$

### II. Elective Course (6 Credits)

(8 Papers)

A.1. Discipline Specific Elective  $4 \times 4 = 16$   $4 \times 5 = 20$   
(4 Papers)

A.2. Discipline Specific Elective  $4 \times 2 = 8$   $4 \times 1 = 4$   
Practical/ Tutorial\*  
(4 Papers)

B.1. Generic Elective/  
Interdisciplinary  $4 \times 4 = 16$   $4 \times 5 = 20$   
(4 Papers)

B.2. Generic Elective  $4 \times 2 = 8$   $4 \times 1 = 4$   
Practical/ Tutorial\*  
(4 Papers)

Optional Dissertation or project work in place of one Discipline Specific Elective paper (6 credits) in 6<sup>th</sup> Semester

**III. Ability Enhancement Compulsory Courses (AECC)**

**(2 Papers of 4 credit each)                      2X4=8                      2X4=8**

i. Environmental Science

ii. English/Hindi//MIL Communication

**2. Skill Enhancement Courses (SEC)**

**(2 Papers of 4 credits each)                      2X4=8                      2X4=8**

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**TOTAL CREDITS    148    148**

‘Institute should evolve a system/policy about ECA/General Interest/ Hobby/ Sports/NCC/NSS/related courses on its own’.

\*Wherever there is a practical there will be no tutorial and vice-voce.

## 9. Details of Suggested Courses

### A. Core Course (14)

Credits 14X4 = 56

1. Conceptual Aspects of War
2. Military History of India
3. International Relations – Defence Aspects
4. National Security – Conceptual Aspects
5. National Security of India
6. Strategic Thought
7. Military Psychology
8. Disaster Management
9. India's Maritime Security
10. Regional Security and Cooperation
11. Science and Technology in relation to Warfare
12. Economic Aspects of National Security
13. Contemporary Strategic Environment in India
14. Geo Politics and Military Geography

**Note – For Honours Course Programme all 14 Courses are to be taken and for Regular Course programme any 12 Courses may be taken.**

**B. Discipline Specific Elective (DSE)**

Credits 4X4 = 16

1. Cyber Security
2. Remote Sensing and National Security
3. Legal Aspects of International Security
4. International Terrorism
5. Non Traditional Security Threats
6. WMD, Nuclear Proliferation and National Security
7. Defence Mechanism of Modern States
8. Conflict Resolution and Peace Building
9. **Project work/dissertation** **6 Credits**

**Note – For Honours Course programme any 4 Courses and for Regular Course programme any 2 courses may be taken.**

**C. Generic Elective (Interdisciplinary)**

Credits 4X4 = 16

1. Functional Research Methodology
2. International Relations
3. Military Sociology
4. Insurgency and Counter Insurgency
5. Human rights and Humanitarian Law
6. Conflict and Media

**Note – For Honours Course programme any 4 Courses and for Regular Course programme any 2 courses may be taken.**

**\*\*The candidates would be free to choose courses offered under the cafeteria approach for CBCS by the respective university/college and earn credits as required.**

**D. Ability Enhancement Courses (AEC) - Compulsory** Credits 4X2 = 08

1. Environmental Science
2. English/Hindi/MIL Communication

**E. Skill Enhancement Courses (SEC)** Credits 4X2 = 08

1. Defence Journalism
2. Strategic Leadership
3. General Studies/Current Affairs
4. Computer Applications

**Note - Two Courses may be taken for Honours Course Programme and 4 for Regular Course Programme by the student.**

**F. Practical/Tutorials\*\* – one each with every core and Discipline/Generic Specific Paper.**

\*\*The list of practicals provided in the above content is suggestive in nature and each university/college has the freedom to add/subtract/edit the practical content from the list depending on their faculty and infrastructure available.

## 10. Content for Courses in Defence and Strategic Studies for Under Graduate Programme

### Core Course

#### CORE PAPER – 1

#### CONCEPTUAL ASPECTS OF WAR

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Clearly understand the definition, meaning and distinguish basic concepts of war;
- Various types of war and its various typologies, techniques and characteristics; and
- Grasp the concept and theories of nuclear war in detail.

#### CONTENTS

##### **i. Conceptual Formulation**

- a. Meaning and definition of Defence and Strategic Studies – Its relevance and significance and relationship with other disciplines of study.
- b. **War** - Definition and meaning and basic concepts – War, Campaign, Battle, Strategy, Tactics, Security and Defence.

##### **ii. Modern Warfare**

- a. Concept and definition
- b. Features of Modern Warfare
- c. Principles of warfare

##### **iii. WAR AS AN INSTRUMENT OF POLICY**

##### **iv. Guerilla Warfare**

- a. Origin and concept.
- b. Principles, techniques and characteristics of guerrilla warfare.
- c. Counter guerrilla measures.

##### **v. Psychological Warfare**

- a. Definition and concept.
- b. Functions and Limitations.

**vi. Nuclear Warfare**

- a. Beginning of nuclear era and effects of nuclear explosion.
- b. Nuclear strategies of 'Deterrence' and 'Massive Retaliation'.

**SUGGESTED READINGS:**

- Andreski S., (1968) Military Organization and Society, Univ. California Press, Berkeley.
- Anthony James Joes, (1996) Guerrilla Conflict before the Cold War, (Praeger Publishers,
- Aron R., (1966) Peace and War: A Theory Of International Relations, Praeger, New York.
- Barringer R., 1972) War: Patterns Of Conflict, MIT Press, Cambridge, Mass.
- Blainey G., (1973) The Causes Of War, Macmillan, London.
- Montgomery Viscount, (1983) A History of Warfare, William Morrow & Co, New York City.
- Mukherji and Shyam Lal, (1952) A Textbook of Military Science, Vol. II., Navayuga, New Delhi.
- Osanka, F.M., (1962) Modern Guerrilla Warfare, Free Press of Glencoe, New York.
- Sidhu, K.S., (1988) War and Its Principles, Atlantic, New Delhi.
- Tripathi, K.S., (1970) Evolution of Nuclear Strategies, Vikas, New Delhi
- Wright, Quincy, (1942) Study of War, University of Chicago Press.

**CORE PAPER – 2****MILITARY HISTORY OF INDIA**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Become familiar in evolution of art of warfare in India;
- Learn and understand the Strategy, tactics, application of principles of war and causes of defeat and victory of various Indian, Mughal, Maratha and Sikh Generals.
- Besides, in a position to appreciate and understand evolutionary changes in the art and science of war in India through ages.

**CONTENTS**

- i. Macedonian and Indian Military Organisations and techniques of fighting with particular reference to the Battle of Hydaspes, 326 B.C.:**
  - a. Military Organisations and techniques of fighting of Macedonian and Indians; Opposing forces and their deployment.
  - b. Analysis (strategy, tactics, application of principles of war and causes of defeat and victory).
- ii. Kautilya's Philosophy of War:**
  - a. Diplomacy and Strategy; The institution of Spies; Army Organisation; Mode of Warfare.
  - b. Forts- Types & Role.
- iii. Military organisations and techniques of fighting of Rajputs and Turks with particular reference to the Battle of Tarain, 1192 A.D.:**
  - a. Military organisations and techniques of fighting of Rajputs and Turks; Opposing forces and their deployment.
  - b. Analysis (strategy, tactics, application of principles of war and causes of defeat and victory.)
- iv. Military organisations and techniques of fighting of Mughals with particular reference to the First Battle of Panipat, 1526 A.D.:**
  - a. Military organisation of Mughals; Opposing forces and their deployment
  - b. Analysis (Strategy, tactics, application of principles of war and causes of defeat and victory).

**vi. Military organisations of Marathas under Shivaji and his techniques of fighting:**

- a. Shivaji as a military leader.
- b. Military organisation.
- c. Techniques of fighting.

**vii. Military organisation of Sikh Army and its fighting techniques under Maharaja Ranjit Singh:**

- a. Maharaja Ranjit Singh as a Military leader.
- b. Growth and development of the Sikh Army from 1799-1849
- c. Organisation of the Army
- d. Fighting techniques of the Sikh Army (Strategy and tactics).

**viii. Anglo-Maratha and Anglo-Sikh Warfare with particular reference to the Battle of Assaye, 1803 A.D. and Battle of Chillianwala****a. Battle of Assaye :**

- a. Introduction - Opposing forces and their deployment; Description of the battle.
- b. Analysis (Strategy, tactics, application of principles of war and causes of defeat and victory).

**b. Battle of Chillianwala:**

- a. Introduction - Opposing forces and their deployment; Description of the battle
- b. Analysis (Strategy, tactics, application of principles of war and causes of defeat and victory).

**SUGGESTED READINGS -**

- Alfred, David., (1953) Indian Art of War, Atma Ram , Delhi.
- Bajwa F.S., (1964) Military System of the Sikhs, Moti Lal, Banarsi Dass, Delhi.
- Bruce, George., (1969) Six Battles of India, Rupa & Company, Calcutta.
- Das, S.T., (1969) Indian Military - Its History and Development, Sagar, New Delhi.
- Dikshitar, Ramachandra V. R. (1999) War in Ancient India. Cosmo, New Delhi.
- Fuller, J.F.C., (1958) Generalship of Alexander The Great, Natraj Publishes, Dehradun.
- Gustav Oppert, (1967) Weapons, Army Organisation and Political Maxims of Ancient Hindus, R.F Patel Rajratan Press, Ahmedabad.
- Kangle, R.P., (1963) Kautilya`s Arth Shastra, University of Bombay, Mumbai.

- Majumdar, B.K., (1960) Military System in Ancient India, Firma K.L. Mukhopadhyoy, Calcutta.
- Majumdar, B.N., (1963) Study of Indian Military History. Army Educational Store, Delhi.
- Roy, Kaushik, (2004) From Hydaspes to Kargil: A History of Warfare in India from 326 BC to AD 1999. Manohar, New Delhi.
- Singh, Sarva Daman. (1997) Ancient Indian Warfare: With Special Reference to the Vedic Period. Motilal Banarsidass, New Delhi.

### CORE PAPER – 3

#### INTERNATIONAL RELATIONS – DEFENCE ASPECTS

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- The basic concepts of international relations and how nation-state system works;
- Acquire competency in military and state - centric aspects of international relations; and
- Its repercussions on inter- state affairs and their security dilemma and some economic aspects of war.

#### CONTENTS

- i. International Relations:** Concept, Nature, Scope and its Historical Evolution.
- ii. Contending Theories of International Relations**
  - a. Realism Vs. Idealism
- iii. National Interest**
  - a. Concept and Definition
  - b. Vital and Non-Vital Components
  - c. Instruments to secure National Interest.
- iv. Balance of Power**
  - a. Meaning and concept
  - b. Historical development of the system
  - c. Functioning of the system
- v. Collective Security**
  - a. Meaning and Concept
  - b. Role of the UN in maintaining Collective Security
- vi. Diplomacy:** Definition, Types and uses
- vii. Economic Aspects of International Relations**
  - a. Breton Woods to WTO
  - b. IMF
  - c. World Bank

**SUGGESTED READING**

- Chandra, P., (1979) International Politics, Vikas Publications, N. Delhi
- Curzon, Lord. (1907) Frontiers, Clarendon Press, USA.
- Kumar, Mahendra, (1967) Theoretical Aspects of International Politics, Shiv Lal Agarwal, Agra.
- Morgenthau, Hans J. (1954) Politics Among Nations, Knopf, New York.
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- Robert Art and Robert Jervis eds., (2006) International Politics: Enduring Concepts and Contemporary Issues, Longman Publishing,
- Sprout and Sprout, (1962) International Politics, Princeton, NJ.
- Wright, Quincy, (1980) A Study of International Relations, Irvington Publishers.

**CORE PAPER – 4****NATIONAL SECURITY – CONCEPTUAL ASPECTS**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Develop core competencies in national security affairs by building his/her capacity on essentials of National Security through theory and practice.
- Understand the national security challenges both internal and external a country face; and
- Understand the Contemporary security environment in the world.

**CONTENTS**

- i. National Security: Conceptual Aspects.**
- ii. Elements of National Security**
  - a. Geography
  - b. Mineral resources
  - c. Social, political and economic factors
  - d. Scientific and technological development
  - e. Military preparedness
- iii. Challenges to National Security**
  - a. Internal Challenges
  - b. External Challenges
- iv. Contemporary security environment in the world in brief.**
- v. Military Alliances and their role in 21<sup>st</sup> century**
- vi. Small arms Proliferation, Weapons of Mass Destruction (WMD) proliferation.**

**SUGGESTED READINGS**

- Booth, Ken, (2007), Theory of World Security: Cambridge University Press, Cambridge.
- Buzan, Barry., (1987), People, State and Fear, Trans Asia Publications. New Delhi.
- Chowdhary, Subrata Roy., (1966), Military Alliances and Neutrality in War and Peace, Orient Longman, New Delhi,
- Das, S.T., (1987), National Security in Perspective, Gyan Publishing House, New Delhi.

- Frankel, Joseph, (1970), National Interest, Macmillan London.
- Military Balance., Latest Edition (IISS)
- Morgenthau, Hans J., (1969), Politics Among Nations, Scientific Book Agency, Calcutta.
- Palmer, Norman D. and Perkins, Howard C., (1968), International Relations, Scientific Book Agency, Calcutta.
- Singh, Nagendra., (1974), The Defence Mechanism and the Modern State, Asia Publishing House. New Delhi.
- SIPRI Year Book Latest Edition.

**CORE PAPER - 5****NATIONAL SECURITY OF INDIA**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Equip the students with specific knowledge of India's threat perceptions;
- An assessment at both internal and external level besides fair idea of problems the country faces as a nation state; and
- The Structure, objectives, role and problems of Civil Defence Organization in India.

**CONTENTS****i. National Security**

- a. Meaning and Definition
- b. Threat Perceptions
- c. Types of threats to India

**ii. India's Security Problems since independence.**

- a. Geo-political effects of partition.
- b. Effects of Armed Forces

**iii. External Dimensions of India's security**

- a. Security problems related to Pakistan including Indo-Pak wars.
- b. Security problems related to China including 1962 Sino-Indian war.

**iv. Internal dimension of India's security**

- a. Terrorism in Jammu & Kashmir
- b. Insurgency in North eastern states
- c. Naxalism

**v. Civil Defence Organization in India: - Structure objectives, role and problems.****SUGGESTED READING**

- Bajpai, U.S., (1986) India and its Neighbourhood, Lancer International, New Delhi.
- Baranwal, S.P., (1984) Measures of Civil Defence in India, Guide Publications, New Delhi.

- Bobbing, Ross and Gordon, Sandy, (1992) India's Strategic Future, Oxford University Press. Delhi
- Chatterjee, R.K. (1978) India's Land Borders- Problems and Challenges: New Delhi, Sterling Publishers.
- Chaudhury, Rahul Roy, (1995) Sea Power and India's Security, Brassey's, London,
- Dass, S.T., (1987) National Security in Perspective Gyan Publishers, Delhi.
- Kavic, Lorne J., (1967) India's Quest For Security: Defence Policies 1947-1965, University of California Press, Los Angeles.
- Menon, V.P., (1961) The Story of the Integration of Indian States, Orient Longman, New Delhi.
- Nayar, V.K., (1992) Threats From Within, Lancer Publications, New Delhi,.
- Rao, P.V.R., (1970) Defence Without Drift, Popular Prakashan, Bombay.
- Rao, Ramakrishna and Sharma, R.C., (1991) India's Borders, Scholars' Publishing Forum, New Delhi.
- Singh, Jaswant (1999) Defending India, Palgrave Macmillan India Ltd, New Delhi.

**CORE PAPER – 6****STRATEGIC THOUGHT**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Acquaint them with the concepts of strategic thinking as propounded by prominent classical and modern thinkers.
- Students will also develop analytical thinking regarding relevance of such thought to contemporary period.

**CONTENTS**

- i. Kautilaya's Philosophy of war.
- ii. Sun Tzu- The Art of war.
- iii. Clausewitz's theories on war.
- iv. Mao-Tse-Tung's views on Guerrilla warfare.
- v. J.F.C. Fuller and Liddell Hart: Their views on warfare
- vi. Mahan's Views on Sea Power and Naval Warfare.
- vii. Douhet and Mitchell: Their views on the Role of Air Power in Modern Warfare.
- viii. John Foster Dulles and Andre Beaufre - Theories of Nuclear War and Deterrence.

**SUGGESTED READING**

- Beaufre Andre ., (1965) Deterrence and Strategy, Faber & Faber, London.
- Dass, S.T., (1987) An Introduction to the art of war, Sagar Publishers, New Delhi.
- Duffy, Christopher., (1987) Siege Warfare, Routedledge & Kegen Paul, UK.
- Earl, E.M., (1943) Makers of Modern Strategy, Princeton University Press, Princeton.
- Fuller, J.F.C., (1992) The Conduct of war: : A Study of the Impact of the French, Industrial, and Russian Revolutions on War and Its Conduct, Da Capo Press, New York,
- Fuller, J.F.C., (1998) Armament and History: The Influence of Armament on History from the Dawn of Classical Warfare to the End of the Second World War, Da Capo Press, New York.
- Greene, T.N., (1962) The Guerrilla and How to Fight Him, Fredrick A Praeger, New York.

- Mao-Te-Tung., (1967) On the protracted War: Selected works, Foreign Language Press, Peking.
- Nasution, Abdul Haris., (1965) Fundamentals of Guerrilla Warfare, Fredrick A Praeger, New York.
- Reid, Brian Holden., (1987) J.F.C.Fuller: Military Thinker, Palgrave MacMillan, UK.
- Ropp, Theodore., (2000) War in the Modern World, The John Hopkins University Press, Baltimore, MD.
- Shyama Shastri., (2012) Kautilya's Arthashastra, Low Price Publications, New Delhi.
- Tzu, Sun., (2015) The Art of War, Grapevine India Publishers, New Delhi.

**CORE PAPER – 7****MILITARY PSYCHOLOGY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- To understand and appreciate psychological aspects of war making, military leadership and emotional issues that is faced by soldiers during war and peace.
- Apart from this, they will also learn the importance of leadership, discipline man management, motivation and morale factors in a soldiers' life.

**CONTENTS**

- i. Military Psychology: Definition, Scope, Significance and its role during war and peace.
- ii. Psychological Weapons of War: Propaganda, rumor and indoctrination.
- iii. Fear and Panic in War: Causes, Consequences and management.
- iv. Military Leadership: Meaning, attributes, importance and role of training.
- v. Discipline: Definition, purpose and tools of maintaining discipline.
- vi. Motivation and Morale factors and their utilization in the armed forces.
- vii. Man Management:-Concept, importance and strategy vis-à-vis armed forces.
- viii. Emotional problems and adjustment during war and peace.

**SUGGESTED READING**

- Bartlett, F.C., (1927) Psychology and the Soldier, Cambridge University Press, Cambridge.
- Baynes, John., (1967) Morale: A study of Men and courage, Cassell, London.
- Boring, Edward G., (ed.), (1945) Psychology for the Armed Services, Natraj Publishers, Dehradun.
- Chibber, M.L. (1986) Military Leadership to Prevent Military Coup, Lancer International, New Delhi.
- Copeland, Norman, (1967) Psychology and the Soldier, English Book Depot, Dehradun.

- Hasnain Qamar, (1967) Psychology for the fighting man, English Book Depot, Dehradun.
- Linebarger, P.M.A., (1954) Psychological Warfare, Combat Press, Washington, D.C.
- Nidhi Maheshwari, (2016) Military Psychology: Concepts, Trends and Interventions, Sage Publication India Pvt Ltd, New Delhi.
- Raj Narain, (1979) Military Psychology, National Psychological Corporation, Agra.

**CORE PAPER – 8****DISASTER MANAGEMENT**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Understand the concepts of disaster and disaster management in detail;
- They will also come to know about disasters - both natural and manmade and its impact on society and ecological systems.
- Students will also acquire knowledge on policies and actions regarding preparedness, mitigation, relief and rehabilitation.

**CONTENTS**

- i. Disaster Management: Concept & significance.
- ii. Approaches to disaster management: Rationale, elements and objectives of disaster management.
- iii. Dimensions and typology of Disasters:
- iv. Natural disasters- include broad outlines regarding natural and non-natural disasters such as; earthquake, volcanic eruptions, floods, landslides, avalanches, tsunamis, cyclone, climatic change, drought, epidemics and war.
- v. Manmade Disasters- include Industrial accidents, soil degradation, desertification, deforestation, depletion of water resources, destruction of ecological system, landslides, fire, oil spill, breakdown of essential services etc.
- vi. National Disaster management policy- significance, principles and policy options.
- vii. Disaster management in developed and developing nations.

**SUGGESTED READING**

- Bourriau, Janine; (1992) Understanding Catastrophe; Cambridge University Press, Cambridge,.
- Carter, W. Nick., (1991) Disaster Management- A Disaster Manager's Handbook, A.D.B., Manila, Philippines.
- Coppola, P. Damon, (2006) Introduction to International Disaster Management, Elsevier.
- Garlake, Teresa, (2000) Dealing with Disasters, Oxfam Education, Oxford.

- Goel S.L. and Ram Kumar, (2001) Disaster Management, Deep Publications Pvt. Ltd., New Delhi.
- Goel, S.L., (2006) Encyclopedia of Disaster Management, Deep and Deep, New Delhi.
- Narayan, B., (2000) Disaster Management, APH Publishing Corporation, New Delhi.
- Sharma V.K. (2013) Disaster Management, IIPA, New Delhi.
- Singh, Shailendra K, Kundu, Subhash C and Singh, Shobha, (1980) Disaster Management; Mittal Publications, New Delhi.

**CORE PAPER – 9****INDIA'S MARITIME SECURITY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Realize the importance of oceans for a state in terms of its survival and sustenance, especially India being a peninsular country.
- Besides, also get exposure on various threats emanating from the seas; and
- Also understand and realize various existing policy measures and mechanisms to handle the threats from the sea.

**CONTENTS**

- i. Geo-political and geo-strategic significance of Indian Ocean.
- ii. Economic significance of Indian Ocean region.
- iii. Regional conflicts in Indian Ocean Region.
- iv. Extra-regional powers' interests and involvement in Indian Ocean.
- v. India's strategic perspective in Indian Ocean.
- vi. India's maritime interests in Indian Ocean.
- vii. India's threat perceptions in Indian Ocean.
- viii. India's maritime/naval capabilities.

**SUGGESTED READING**

- Chaudhury Rahul Roy, (1995) Sea power and Indian security, Brassey's, London.
- Chaudhury Rahul Roy, (2000), India's Maritime Security, Knowledge World, New Delhi.
- C. Uday Bhaskar, and Cdr KK Agnihotri, (2011) Security Challenges along the Indian Ocean Littoral, Indian and US Perspectives, National Maritime Foundation, New Delhi.
- K. M Panikkar, (1951), India and the Indian Ocean, Allen & Unwin, London.
- Martin, L.W. (1967), Sea in modern strategy, Chatto & Windus.
- Mishra R.N, (1986), Indian Ocean and India's Security, Mittal Publications, New Delhi.
- Naidu, GVC, (2000) Indian Navy and Southeast Asia, IDSA, New Delhi.

- Ravi Vohra and P K Ghosh, (2008) China and the Indian Ocean Region, National Maritime Foundation, New Delhi.
- Ravi Vohra & P K Ghosh, Freedom of the Seas: A Contemporary Outlook, National Maritime Foundation, New Delhi.
- Raja Mohan, (1998), Maritime Strategy and Continental Wars, Routledge.
- Sharma, RC and Sinha PC, (1994), India's Ocean Policy, South Asia Books, New Delhi.

**CORE PAPER – 10**  
**REGIONAL SECURITY AND COOPERATION**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Understand the theoretical dimensions of 'Region' in International Relations.
- Conceptual Dimensions of Regional Security; Regional Cooperation and Military Alliances; and
- Students would get to understand nuances of regional cooperation, its benefits and drawbacks by learning various existing regional cooperative mechanisms across the globe.

**CONTENTS**

- i. Theoretical dimensions of 'Region' in International Relations.
- ii. Regional Security; Regional Cooperation; and Military Alliances : Conceptual Dimensions
- iii. North Atlantic Treaty Organisation - (NATO): Aim, Organisation and Working.
- iv. Association of South-East Asian Nations - (ASEAN): Concept, Objectives, Features, Problems & Achievements.
- v. Shanghai Cooperation Organisation (SCO) - Aim, Organisation and Working.
- vi. Non-aligned Movement (NAM):-History, Features, Problems, achievements and relevance in Contemporary period.
- vii. South Asian Association for Regional Cooperation-(SAARC): Concept, Objectives, Features; Problems & Achievements.
- viii. Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC): Concept, Objectives, Features; Problems & Achievements.

**SUGGESTED READINGS**

- Buzan, Barry and Waever, Ole (eds) (2003) Regions and Powers : The Structure of International Security, Cambridge University Press. Cambridge.
- Buzan, Barry, (1987) People Fear and State, Transasia Publications, New Delhi.
- Chaudhury, Subrata Roy, (1966) Military Alliances and Neutrality in War and Peace: Orient Longman, New Delhi.
- Das, S.T., (1987) National Security in Perspective: Delhi, Gyan Publishing House.

- Frankel, Joseph, (1970) National Interest, Macmillan, London.
- Garnett, John(ed) (1970) Theories of Peace and Security, Macmillan , London.
- Morgenthau, Hans J., (1969) Politics Among Nations: Scientific Book Agency, Calcutta.
- Palmer Perkins, Norman D. and Howard C., (1968) International Relations: Scientific Book Agency, Calcutta.
- Singh, Nagendra, (1974) The Defence Mechanism and the Modern State, Asia Publishing House, New Delhi,.
- SIPRI Year Book

**CORE PAPER - 11****SCIENCE AND TECHNOLOGY IN RELATION TO WARFARE**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Acquire knowledge on how significant the role of science and technology is to Society and to National Security.
- The paper also provides realization in contemplating on the military-industrial complex (MIC) of a nation; besides
- Understanding the concepts and applications of Electronics Warfare and Ballistic Missile Defence (BMD).

**CONTENTS**

- i. Science, Technology and National Security.
- ii. Impact of Science and Technology on Society and warfare.
- iii. Transfer of Technology:
  - a. International interdependence
  - b. Role of Multinational Corporations.
- iv. Armament technology (in brief):
  - a. Armoured vehicles: Tanks and APC's
  - b. Aircrafts, UAV's and Missiles
  - c. Submarine and Aircraft carrier
- v. Electronics Warfare: Concept and applications
- vi. Ballistic Missile Defence (BMD): Concept and applications.

**SUGGESTED READING**

- Anand. A. (2003) Information Technology: The future warfare weapons, Ocean Books, New Delhi.
- Arcangelis, Mariode, (1990) Electronics Warfare, Ratna , New Delhi.
- Baranson, Jack. (1978) Technology and the Multinationals, Lexington Books, Lexington.

- Jasbir R.K, (1987) Handbook of military science and Armament Technology, Natraj publications, Dehradun.
- Johan Erickson (Ed.) (1966) The Military Technical Revolution: Its Impact on strategic and Foreign Policy, Frederick A Praeger, New York.
- Macksey, Kenneth (1986) Technology in War: The impact of Science on weapon development and modern battle, Prentice Hall, New York.
- Mann T.S., (1982) Transfer and Technology, Himalaya Publications House, Bombay.
- Rajan, Y.S. (2001) Empowering India (with Economic Business & Technological strengths for the twenty First Century), Har Anand Publications, New Delhi,.
- Rehman, A. (1972) Science Technology and Society, People's Publishing House, New Delhi.
- Robert H . Latiff, (2017) Future war : Preparing for the new global battlefield, Penguin Random House, New York.
- Singer, H.W.,(1988) Technology Transfer by Multinational Vol. I& II, Ashish Publishing House, New Delhi.
- Tiwari V.M. and Rajinikanth, (1996) The high tech war at twentieth Century, Vikas Publishing, New Delhi.

**CORE PAPER – 12****ECONOMIC ASPECTS OF NATIONAL SECURITY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Mutual complementarities of economics and security would be learnt through this course.
- Also students learn the art of mobilizing resources for war, be it physical, fiscal or moral; and
- The importance of Logistics in War and the role of Defence Planning, Programming and Budgeting in India.

**CONTENTS**

- i. Defence Economics: Meaning, Definition and Scope.
- ii. Defence and Development: Concept and its implications for India;
- iii. Economic Warfare; Effects of War on National Economy.
- iv. Assessment of War Potential (Resources of War) of a nation;
- v. Mobilization of Resources for War with reference to Physical, Fiscal and Moral Mobilization.
- vi. Importance of Logistics in War.
- vii. Defence Planning, Programming and Budgeting in India.

**SUGGESTED READING**

- Ghosh, A. K., (1996) India's Defence Budget and Expenditure Management in wider Context, Lancer, New Delhi.
- Clark, J.J., (1996) The New Economics of National Defence, Random House.
- Jack, D.T., (1940) Studies in Economic Warfare, PS King & Sons, London.
- Jalan, B. (2000) India's economic policy- preparing for 21<sup>st</sup> century, Penguin, New Delhi.
- Knor, Klaus, (1962) War Potential of the Nations, Princeton University Press.
- Mathews, Ron, (1998) Defence production in India, ABC Publishers, New Delhi.
- Sandler T., Hartley K, (1995) The Economics of Defence, Cambridge University Press.
- Singh Jasjit, (2001) India's Defence Spending, Knowledge World, New Delhi.
- Subramanyam, K, (1972) Perspective in Defence Planning, Abhinav Publications, New Delhi.

- Subramanyam, K, (1973) Defence and Development, Minerva, Calcutta.
- Thomas, Raju G. C., (1978) The Defence of India: A Budgetary Perspective of Strategy and Politics, Macmillan, Bombay.

**CORE PAPER – 13****CONTEMPORARY STRATEGIC ENVIRONMENT**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn contemporary challenges to peace and stability in the world.
- The contemporary problems of international threats like ISIS, Uyghers, Jaish e Mohammed, Islamic fundamentalism and other issues threatening international peace and security; and
- The course also makes them learn to contemplate response mechanisms to solve conflictual issues.

**CONTENTS**

- i. Conflict in Korean Peninsula: Genesis and Contemporary Trends.
- ii. Israel - Palestine Conflict: Genesis and Contemporary Trends.
- iii. Afghanistan in Post Taliban Period and Contemporary Trends.
- iv. Islamic Fundamentalism in Af-Pak region: Challenges and Responses.
- v. ISIS and Conflict in Iraq and Syria: Challenges and Responses.
- vi. Conflict in South China Sea: Contemporary Trends.
- vii. Problem of Jammu & Kashmir: Genesis and Contemporary Trends.
- viii. Uyghur Crisis in China: Genesis and Contemporary Trends.

**SUGGESTED READING**

- Buzan, Barry and Waever, Ole (eds) (2003) Regions and Powers, Cambridge.
- Chauhan, Sharad S., (2003) War on Iraq:, APH Publishers, New Delhi.
- Cooley, John K., (2000) Unholy Wars, Penguin Books, New Delhi.
- Gilbert, Adrian, (2000) The Encyclopedia of Warfare, Grange Books, Kent.
- Goldstein, Joshua S, (1994) International Relations, Harper-Collins New York.
- Hiro, Dilip, (2002) War without End, Routledge, London.
- Laqueur, Walter, (2003) No End to War, Continuum, New York.
- Midlarsky, Manus I. (ed.) (1989) Handbook of War Studies, Unwin Hyman, London.
- Moore, John Norton (ed) (1977) The Arab-Israeli Conflict, Princeton University Press.

- Nye, Joseph S. (2008) *Understanding International Conflicts: An Introduction to Theory and History* (7th Edition), Longman.
- Noah Coburn, (2016). *Losing Afghanistan*, Stanford University Press, Stanford, California.
- Tomsen Peter, (2011) *The Wars of Afghanistan: Messianic Terrorism, Tribal Conflicts, and the Failures of Great Powers*, Public Affairs, New York.
- Tucker, Spencer C. (2001) *Who's Who in Twentieth-Century Warfare*, Routledge, London.

**CORE PAPER – 14****GEO POLITICS AND MILITARY GEOGRAPHY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn the concepts and relevant attributes of geo politics and military geography for national security.
- Concept and difference between Frontiers and Boundaries, its various types; and
- They shall be in a position to comprehend strategic policies for a nation state and most especially India in our case.

**CONTENTS****i. Introduction**

- a. Concept and meaning of Geo-politics
- b. Scope and importance of Geo-politics

**ii. Meaning, nature and scope of Military Geography.**

**iii. Elements of Military Geography** - Earth size, shape, location, climate, topography & population.

**iv. Evolution of Military Geography.**

- a. History & Development.
- b. Founders of Military Geography - A.T. Mahan, Mackinder, Karl Haushofer.

**v. Inter-State relations & Geographical factors.**

- a. Frontiers and Boundaries - meaning & differences; types; boundary making & function.
- b. Communication routes- land, sea and aerial- strategic scope.

**vi. Geography and Foreign Policy of India.**

- a. India's Geo - strategic significance-location, size, shape, climate, topography, resources etc.
- b. India's borders - nature and characteristics of land border; maritime boundary.
- c. Indian Ocean territory and strategic significance.

**SUGGESTED READING**

- Das, S.T., (1985) Geo-Strategies, Kitab Mahal, Allahabad.
- Black, Jeremy, Cambridge Illustrated Atlas, (1996) Warfare, Renaissance to Revolution: 1492-1792, Cambridge University Press, Cambridge.
- Chandler, David G., (1996) Atlas of Military Strategy : The Art, Theory and Practice of War, 1618-1878, Arms and Armour London.
- William D Puleston, (1939) The Life and Work of Alfred Thayer Mahan, U.N.S. (New Haven, CT,)
- Earl Meade, Edward, (1948) Makers of Modern Strategy: Military Thought from Machiavelli to Hitler, Princeton University Press, Princeton, NJ.

## B. Discipline Specific Electives

### PAPER - 1

#### CYBER SECURITY

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Enable students to learn the nuances of the cyber world by understanding cyber threats, to state, institution and individuals.
- It will also provide an exposure to cyber policy and preparedness mechanisms.
- Students might also get hands-on experience in trying out practical applications of cyber security.

#### CONTENTS

- i. **Introduction to Cyber Technologies** - Information Systems - Networks/LAN/WAN - Military Sensors
- ii. **Types of Cyber Crime** - Hacking - Password Cracking - Insecure Network Connection – Theft at Tele Communication Services
- iii. **Impact of Cyber Crime on National Security** - Impact on Armed Forces & Law enforcement Agencies' Information Systems - Impact on National Economy/Market - Impact on Citizen Security.
- iv. **Detection and Prevention methodologies** - Risk Identification - Levels of Protection - Cyber Defensive Measures
- v. **Cyber Laws** - Cyberspace and the Law - Introduction, Cyber Security Regulations, Roles of International Law, the state and Private Sector in Cyberspace, Cyber Security Standards. The INDIAN Cyberspace, National Cyber Security Policy 2013.

#### SUGGESTED READINGS:

- Beidleman, Scott W. (2009) Defining and Deterring Cyber War, Master's thesis, U.S. Army War College.
- Borum, Randy, and Ronald Sanders, (2015) Cyber Intelligence: Preparing Today: for Tomorrow's Threats, Intelligence and National Security Alliance.
- Godbole Nina, (2011) Cyber Security, Wiley India, New Delhi.

- Godbole Nina, (2017) Information Systems Security: Security Management, Metrics, Frameworks and Best Practices, Wiley India, New Delhi.
- Shoemaker, Dan and Conklin, Arthur (2011) Cyber Security – The Essential body of Knowledge, Cengage Learning.
- Kim Andreasson, ed., (2012) Cyber Security – Public Sector threats and responses, CRC Press, Boca Raton, FL.
- Lin V Choi ed., (2005) Cyber Security and Homeland Security, Nova Publishers, New York.

**PAPER – 2****REMOTE SENSING AND NATIONAL DEFENCE**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Significance of Remote Sensing for National Defence.
- Build capacity on the technical arena of remote sensing application to National Security and impart knowledge on benefits and pitfalls.
- Students will also get the feel of various remote sensing equipments.

**CONTENTS**

- i. Significance of Remote Sensing for National Defence.**
- ii. Remote Sensing:** Basic principles of remote sensing; aerial photography definition, scope, application.
- iii. Concept of remote sensing:** Generation of electromagnetic radiation; imaging system; interaction with atmospheres and Earth surface; sensing platform sensor system.
- iv. Photogrammetry and its significance in remote sensing:** Steps of image interpretations; image displacement, orientation etc.

**SUGGESTED READING**

- C. S. Agarwal and P. K. Garg , (2002) Textbook on Remote Sensing, A.H Wheeler Publishing.
- Cracknell A.P. (1990) Introduction to Remote Sensing, Taylor & Francis, London.
- Curran, P.J. (1985) Principles of Remote Sensing, Longman, London.
- Lueder, D.R., 1959 Aerial Photographic Interpretation, McGraw-Hill, New York.
- Thomas M. Lilles and, Ralph W. Kiefer and Jonathan W. Chipman, (2015) Remote Sensing and Image Interpretation 7<sup>th</sup> edition, Wiley.

**PAPER – 3****LEGAL ASPECTS OF INTERNATIONAL SECURITY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Understand the basic aspects of international law.
- Learn various aspects of legal provisions and practices in international security.
- Learns basics of laws of warfare through existing international legal principles.

**CONTENTS****I. Introduction**

- a. Definition of International Law – Its history and development
- b. Nature, source and codification
- c. Relationship between International Law and Municipal Law.

**II. Laws of war – I**

- a. War – Its legal character and effects
- b. Pacific and Coercive means to settle international disputes

**III. Laws of war – II**

- a. Laws of Land warfare
- b. Laws of Maritime warfare
- c. Laws of Aerial Warfare

**IV. Laws of Neutrality**

- a. Basic understanding of laws of neutrality
- b. Contraband and Doctrine of Continuous Voyage

**V. Legal Mechanisms**

- a. Blockade – Concept establishments Kinds and Penalties for breach
- b. Prize courts Its role and importance
- c. Role and functions of International court of Justice.

**SUGGESTED READING**

- Tandon, M.P, and Rajesh Tandon, (1987) An Introduction of International Law, Allahabad Law Agency, Allahabad.
- Kapoor, S.K., (1987) International Law, Central Law Agency, Allahabad.
- Chavan, R.S., (1971) An Approach to International Law, Sterling Publisher, New Delhi.
- Starke, J., (1972) An Introduction to International Law, Buttersworth, London.
- Oppenheim, L (2008) International Law. 9<sup>th</sup> Edition, University of Cambridge.

**PAPER - 4****NON TRADITIONAL SECURITY THREATS**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Realizes that there are nontraditional threats to nation's security other than military which are of equally grave consequences.
- Understand that, drug trafficking, money laundering, narco terrorism and human trafficking are equally dangerous as war.

**CONTENTS**

- i. Human Security – Definition, meaning and concept
- ii. Environment Security – Definition, meaning and concept
- iii. Energy Security – Definition, meaning and concept
- iv. Illegal Migration – Definition, meaning and concept
- v. Narco -Terrorism – Definition, meaning and concept
- vi. Small Arms Proliferation – Definition, meaning and concept
- vii. Organized Crimes - – Definition, meaning and concept
- viii. Money Laundering - – Definition, meaning and concept

**SUGGESTED READING**

- Happymon Jacob, (2005), HIV/AIDS as a Security Threat to India.
- Joakim Palme, Kristof Tamas (2006), Globalizing migration regimes: new challenges to transnational cooperation.
- Kimberley L. Thachuk, (2007), Transnational threats: smuggling and trafficking in arms, drugs, and human life.
- Lal, Marie, (2008), The geopolitics of Energy in South Asia, Institute of Southeast Asian Studies, Singapore,
- Leena, (2009), Energy Infrastructure: Priorities, Constraints and Strategies for India, Oxford, India.

- Margaret E. Beare, (2003), Critical reflections on transnational organized crime, money laundering and corruption.
- Mely Caballero Anthony, Ralf Emmers, Amitav Acharya (Eds), (2006), Non-Traditional Security in Asia: Dilemmas in Securitization, Athenaeum Press Ltd,
- Moufida Goucha, John Crowley (2008), Rethinking human security.
- Richard A. Matthew and John Barnett, Bryan Macdonald and Karen L. O'Brien (2010) Global environment Change and Human Security.
- Robert Powis, (1992), The Money Launderer, Probus Publishing.
- Shahrbanou Tadjbakhsh, Anuradha M. Chenoy (2007) Human security: Concepts and Implications. Routledge Advances in International Relations and Global Politics.
- Sovacool K. Benjamin (2011), The Routledge Handbook of Energy Security. Singapore.

## PAPER – 5

### INTERNATIONAL TERRORISM

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn various typologies of terrorism in its different shades.
- By conducting case studies, students will also be in a position to understand terrorism sponsored by state and other stakeholders; and
- How international community cooperates against this scourge.

### CONTENTS

- i. Terrorism: Meaning, concept, philosophy and historical perspective.
- ii. Causes of Terrorism: Social, Economic, Political and Religious.
- iii. International Terrorism.
- iv. State Terrorism & State-sponsored Terrorism.
- v. Terrorism and National Security.
- vi. Strategies of Combating Terrorism.
- vii. Manifestations of terrorism: Small Arms Proliferation, Drug Trafficking and Money laundering.

### SUGGESTED READING

- Alexander, Yonah and Seymour, Maxwell Finger (eds) (1977) Terrorism : Interdisciplinary Perspective: New York, The John Jay Press.
- Brass, Paul R., (1991) Ethnicity and Nationalism: New Delhi, Sage Publications.
- Combs, Cindy C., (1997) Terrorism in the Twenty-first Century: New Jersey, Prentice Hall.
- Juergensmeyer, Mark (ed), (2001) Terror in the Mind of God- The Global Rise of Religious Violence: New Delhi, Oxford University Press.
- Kartha, Tara, (1999) Tools of Terror: Light Weapons and India's Security: New Delhi, Knowledge World and IDSA.
- Lequeur, Walter, (1977) Terrorism: London, Little Brown and Company.

- Lequeur, Walter, (1987) *The Age of Terrorism*: London, Little Brown and Company.
- Lequeur, Walter, (2003) *No End to War*: New York, Continuum.
- Lequeur, Walter, (1999) *The New Terrorism*: Oxford, Oxford University Press.
- Marwah, Ved, (1995) *Uncivil Wars: Pathology of Terrorism in India*: New Delhi, Harper Collins.
- Sondhi, M.L.(ed), (1990) *Terrorism and Political Violence- A Source Book*: New Delhi, Har-Anand Publications.
- Wardlaw, Grant, (1982) *Political Terrorism*: Cambridge.
- Wilkinson, Paul, (1987) *Terrorism and the Liberal States*: New York, University Press.

**PAPER – 6****WMD, NUCLEAR PROLIFERATION AND NATIONAL SECURITY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn and realise gravity of WMDs on the nation's security.
- Learn and anticipate proliferating use of WMDs and prevention; and
- Also learn the basic Concepts and Theories and approaches to Disarmament & Arms Control.

**CONTENTS**

- i. Weapons of Mass Destruction - Nuclear Weapons, Chemical & Biological Weapons.
- ii. Basic Concepts and Theory of Disarmament & Arms Control, Approaches to Disarmament & Arms Control
- iii. Historical Survey of Disarmament Efforts:
  - a. Under the League of Nations
  - b. Under the United Nations
  - c. Unilateral, Bilateral and Multilateral approaches
- iv. Convention and Biological Weapons Convention.
- v. Concept of Nonproliferation, Nonproliferation Treaty, CTBT, PTBT, MTCR & other treaties.
- vi. Terrorism and Nuclear Proliferation.

**SUGGESTED READING**

- Emile Benoit & K.E. Bonding, (1963) Disarmament and the Economy, Harper & Raw Publisher, New York.
- Faramazyan, R (1981) Disarmament and the Economy, Progress Publishers, Moscow.
- Kennedy, Garin (1974) The Military in the Third World, The Garden City Press, London.
- Military Balance, (Latest Edition), IISS, London
- Mishra, P.K. (1989) Arms Race Disarmament and Indian Ocean, UDH Publishing House, New Delhi.

- SIPRI Year Book.
- Strategic Analysis, IDSA , New Delhi
- Strategic Digest, IDSA, New Delhi
- Strategic Survey, (Latest Edition), IISS, London

**PAPER – 7****INDIAN DEFENCE MECHANISM**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn the Rank Structure of the Three Services and Recruitment methods for Defence Services.
- Know the Higher Defence Organizations of India; and
- Learn about the defence mechanism of India and evaluate its strengths and weaknesses.

**CONTENTS****i. The Indian Defence Forces**

- a. Rank Structure of the Three Services.
- b. Recruitment methods for Defence Services.
- c. Important training Institution of the Three Services.
- d. Second line defence [introduction to Paramilitary Forces in brief]

**ii. Higher Defence Organizations of India**

- a. Power of the President of India in relation of Defence.
- b. Role and function of Ministry of Defence.
- c. Composition and function of Defence Committees/NSC.
- d. Chief of Staff and joint service Organization.

**iii. Army Organization**

- a. Organization of army Headquarters (Role of COAS and PSOs).
- b. Static and Field formation of Indian Army.
- c. Arms and Services.

**iv. Air Force Organization**

- a. Organization of Air Force Headquarters (Role of CAS and PSOs).
- b. Static and Field formation of Indian Air Force.

**v. Navy Organization**

- a. Organization of Naval Headquarters (Role of CNS & PSOs).
- b. Static and Field formation of Indian Navy.

### **SUGGESTED READING**

- Government of India, (1924) The Army of India and its Evolution, Calcutta.
- Ministry of Defence, Government of India, Indian Armed Forces Year Book, (Annual).
- Palit, D.K., (1989) Essentials of Military Knowledge, New Delhi.
- Singh, Nagendra., (1967) Defence Mechanism of Modern State, New Delhi.
- Venkateswaran, A.L., (1967) Defence Organisation in India, New Delhi: Government of India.

**PAPER – 8****CONFLICT RESOLUTION AND PEACE BUILDING**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn the meaning and concept of Conflict Resolution and Peace Building.
- Study the methods for conflict resolution; and
- In creating win-win situation by peaceful methods of resolving issues or conflicts between nation states.

**CONTENTS**

- i.** Conflict Resolution and Peace Building: Concept and Significance.
- ii.** Nature of Conflict: Inter – state and Intra – state.
- iii.** Methods for conflict resolution:-
  - a. Pacific Methods
  - b. Coercive Methods.
- iv.** Peace Building: Local, Regional and International perspective.
- v.** Confidence Building Measure: Concept and Techniques
- vi.** Conflict Resolution and Peace Building:
  - a. Role of IGOs,
  - b. Role of NGOs and,
  - c. Role of UN.

**SUGGESTED READING**

- Barash, David, P. (2014) Approaches to Peace: A Reader in Peace Studies, Oxford University Press, London.
- Garnett Johan, (1970) Theories of Peace and Security, Palgrave Macmillan, London.
- Galtung, Johan, (1996) Peace by Peaceful Means: Peace and Conflict, Development and Civilization, Sage Publications, London.
- Galtung, Johan, (1984), The Struggle for Peace, Navajivan Publishing House, New Delhi.

- Kadloor, Savitri (2015) Conflict Resolution and Peace Building: UN Engagement in Cambodia, Pentagon Press, New Delhi.
- Murty, K. Satchidananda, (1986) Quest for Peace, Ajanta Publications, New Delhi.
- Murty, K. S. and Bouquet A. C., (1960) Studies in the Problems of Peace, Asia Publication House, Bombay.
- Rennie, Linda Forcey (ed.), (1986) Peace: Meanings, Politics and Strategies, Praeger, New York.
- Wallensteen, Peter ed. (1988) Peace Research: Achievements and Challenges, Westview Press, Boulder CO.
- Sandole, Dennis J.D. (2010), Peace Building: Preventing Violent Conflict in a Complex world, Polity Press, UK.
- Ursula, Oswald, (ed.), (2000) Peace Studies from a Global Perspective, Maadhyam Books, New Delhi.

## **PAPER – 9 DISCIPLINES SPECIFIC**

**Project work/dissertation (6 Credits) – Involving application of knowledge in solving/analyzing/exploring real life situation/difficult issues related to Defence and Strategic Studies (Project/dissertation work may be given in lieu of discipline specific elective paper)**

**PART III**  
**Generic Elective (Inter Disciplinary)**

**PAPER – 1**  
**FUNCTIONAL RESEARCH METHODOLOGY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn the basic steps and principles of research methodology.
- Know the basics of citations, bibliography, indices etc.; and
- Learn different categories of information sources and how to access them and utilize them in their academic endeavours.

**CONTENTS**

- i. Research Methodology: meaning of research, characteristics and its significance in social sciences.
- ii. Types and formulation of research design.
- iii. Hypothesis.
- iv. Sampling: concept, principles and types of sampling.
- v. Data collection: observation, questionnaire, schedule & interview.
- vi. Processing & analysis of data.
- vii. Interpretation, processing & report writing.

**SUGGESTED READING**

- Claire Selltiz et al (1959) Research Methods in Social Relations, rev. ed. New York: Holt, Rinehart and Winston
- N. Kerlinger (1964) Foundation of Behavioral Research.
- Festinger, Leon and Katz D., (1976) Research Methods in Behavioral Sciences, Holt, Rinehart, Winston, New York.
- Galtung, Johan (1970) Theory and Methods of Social Research, Allen & Unwin, London.

- Kothari C.R, (2007) Research Methodology- Methods and Techniques, Prentice-Hall, New Delhi.
- Kumar Ranjit, (2011) Research Methodology, 3<sup>rd</sup> Edition Sage Publications, New Delhi.
- Moser C.A. and G. Kalton (1971) Survey Methods in Social investigation, Heineman, London.
- Wilkinson, E.S. and Bhandarkar: P.I. (2010) Methodology and Techniques of Social Research, Himalaya Publishing House, New Delhi.
- Goode, William J. and Hatt, Paul K. ( 1952) Methods of Social Research McGraw-Hill Book Co., New York.

**PAPER – 2****INTERNATIONAL RELATIONS**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Understand and learn various ways in which nation states interact.
- Learn the art of developing, cultivating the role of diplomacy in maintaining relations; and
- Impact of Nuclear Developments on International Relations and New International Economic Order.

**CONTENTS**

- i. Introduction to the understanding of International Relations.
- ii. Theories and Approaches: The Classical (Traditional) Approaches - Idealist and Realist.
- iii. Diplomacy and Foreign Policy.
- iv. Foundations and Limitations of National Power.
- v. Impact of Nuclear Developments on International Relations.
- vi. End of Cold War and emergence of New World Order: New Trends after Sept. 9/11, 2001.
- vii. New International Economic Order.

**SUGGESTED READING**

- Aron, Raymond (2003) Peace and War : A Theory of International Relations, Transaction Publishers.
- Calvocoressi, Peter. (2008) World Politics since 1945, 9<sup>th</sup> Edition Longman.
- Coulombis, T.A and Wolfe, J.H.(1986) International Relations: Power and Justice, Prentice-Hall, New Jersey.
- Frankel, Joseph (1979) International Relations in a changing world, Oxford university Press, London.
- Frankel, Joseph ( 1968) Making of the Foreign Policy: An Analysis of Decision-making, Oxford University Press, London.
- Knorr, Klaus and Verb, Sidney (1967) The International System: Theoretical Essays, Princeton University Press, N.J.

- Kumar, Mahendra (2017) Theoretical Aspects of International Politics, Shivlal Agarwala and Company, New Delhi.
- Morgenthau, Hans J. (1954) Politics Among Nations, Knopf, New York.
- Northedge F.S. ed., (1969) Foreign Policy of the Powers, Faber & Faber.
- Wright, Quincy, (1942) Study of War, University of Chicago Press.

**PAPER – 3**  
**MILITARY SOCIOLOGY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn social aspects of war and post-war social issues like resettlement and reconstruction.
- Also help students understand the problems of ex-service personnel in India; and
- Role of women in armed forces.

**CONTENTS**

- i. Social aspects of war.**
- ii. Social effects of war:**
  - a. Impact on society
  - b. Impact on military.
- iii. Post war social problems:**
  - a. Impact on society: problem of re-settlement of war victims and post war Reconstruction
  - b. Impact on Military: Demobilization, rehabilitation and social adjustment of Released personnel.
  - c. Social problem of military personnel killed or disabled and implications on their families.
- iv. Problems of Ex-servicemen in India**
- v. Role of Women in Armed Forces: Contemporary trends.**

**SUGGESTED READING**

- Baynes, J.C.M., (1972) The soldier in Modern Society, Eyre Methuen, London.
- Doorn, Jacques Van, (1975) The Soldier and Social Change, , Sage Publications, New Delhi.
- Gutteridge, William (1965), Military institutions and power in the new States, Pall Mall Press, London.
- Janowitz, Morris (1959), Sociology and the Military Establishment, Russell Sage Foundation

- Johnson, John (ed.) (1962), *Race, Class & Military: The role of the Military in under developed Countries*, Princeton University Press.
- Parmar, Leena. (1994), *Society, Culture and Military System*, Rawat Publications, Jaipur.
- Parmar, Leena. Ed., (1999), *Military Sociology: Global Perspectives*, Rawat Publishers & Distributors, Jaipur.
- Shaw, Martin (ed.) (1984), *War, State & Society*, Macmillan Press, London.
- Strachey, Alix ( 1957) *The unconscious motives of war.*, Allen & Unwin, London.

**PAPER – 4**  
**INSURGENCY AND COUNTER INSURGENCY**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Differentiate between insurgency and other types of conflicts.
- Assess the causes for the successes and failures of several insurgency movements; and
- How counter insurgency operations are carried out worldwide and India in particular.

**CONTENTS**

- i. Revolutionary war and Guerilla Warfare
- ii. History of Guerilla Warfare
- iii. Theory of Guerilla warfare: Mao – Tse -Tung and Che Guevara.
- iv. Unconventional warfare in the Nuclear Age.
- v. Characteristics, strategy and tactics of Guerrilla warfare
- vi. Modern concepts -Urban Guerrilla warfare and its philosophers.
- vii. Counter- insurgency: Basic principles of success of counter insurgency in the Mountains of Greece and in the jungles of Malaya.

**SUGGESTED READING**

- Das, S T (1970) An Introduction to the Art of War, Sagar Publications, New Delhi.
- Galula, David (1971) Counterinsurgency Warfare, Sagar Publications, New Delhi.
- Guevara, Che (1969) Guerrilla Warfare, Penguin, London.
- Laqueur, Walter, (1977) Guerrilla: A Historical and Critical Study, Weidenfeld and Nicolson, London.
- Lawrence, T.E. (1927) Revolt in the Desert, Jonathan Cape, London.
- Osanka, Franklin Mark (ed.,) (1962) Modern Guerrilla Warfare, The Free Press of Glencoe, New York.
- Palit, D.K. (1970) The Essentials of Military Knowledge, The English Book Depot, Dehradun.

- Pye, Lucian W., (1956) Guerrilla Communism in Malaya, Princeton University Press, Princeton, New Jersey.
- S T Das, (1970) An Introduction to the Art of War, Sagar Publishers, New Delhi.
- David Galula, (1971) Counterinsurgency Warfare, Sagar Publishers.

**PAPER – 5****HUMAN RIGHTS AND HUMANITARIAN LAW**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Learn importance of human rights to individuals and their privileges.
- Human Rights in Indian tradition and Constitutional & Legal framework in India; and
- Role of United Nations in protecting Human Rights.

**CONTENTS**

- i. Human Right:**
  - a. Meaning, Nature and Development.
  - b. Three Generation Rights.
  - c. Contributions: Hobbes, Locke, Rousseau and Rawls.
- ii. United Nations & Human Rights.**
- iii. Indian Perspective (Basics)**
  - a. Human Rights in Indian tradition- Civil, Political, Economic, Cultural Rights & Women's Rights.
  - b. Constitutional & Legal framework in India- Human Rights Commission & Special Commission for weaker section.
- iv. Issues and Challenges (in brief)**
  - a. Human Rights and challenges - Ethnic conflict, social & political violence, global terrorism, environmental sources.
  - b. Rights of Refugees.
  - c. Internally Displaced people.

**SUGGESTED READING**

- Bajwa, G.S., (1995) Human Rights in India : Implementations and Violations, Sterling, New Delhi.
- Deshta, S., Deshta, K., (2003) Fundamental Human Rights, Deep & Deep, New Delhi.
- Donnelly, Jack., (1985) The Concept of Human Rights, St.Martin's Press, New York .

- Gibson, John, S., (1996) Dictionary of International Human Rights Law, Scarecrow Press, Lanham, MD.
- Mehta, P.L., Verma, N., (1999) Human Rights Under the Indian Constitution, Deep & Deep, New Delhi .
- Sehgal, B.P.S., (2004) Human Rights in India : Problems and Prospects, Deep & Deep, New Delhi.

## PAPER – 6

### CONFLICT AND MEDIA

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Understand importance and role of media in conflict situation.
- How that impacts on the public perception besides implications of media on national security and vice versa; and
- Know the media ethics in detail.

### CONTENTS

- i. Conflict and Media: Concept, Meaning and definition.
- ii. Role of Media in International Conflict.
- iii. Information Age and changing dimensions of conflict.
- iv. Increasing Impact of Media on Society and States.
- v. National Security and Role of Media.
- vi. Role of Media in Conflicts: Indian Perspective.
- vii. Terrorism and Media.
- viii. Media ethics and Laws regarding Conflict.

### SUGGESTED READING

- Allen Tim and Seaton Jean, eds., (1999) *The Media of Conflict: War Reporting and Representations of Ethnic Violence*, University of Chicago Press.
- Andrew Hoskins, Ben O’Loughlin (2010) *War and Media: The Emergence of Diffused war*, John Wiley &ons.
- Carruthers Susan, (2000) *The Media at War: Communication and Conflict in the Twentieth Century*, St.Martin’s Press, New York.
- Daya Kishan Thussu, Des Freedman, (2003) *War and the Media: Reporting Conflict 24/7*, Sage Publications, California.
- Gilboa, Eytan (ed) (2002) *Media and Conflict: Framing Issues, Making Policy, Shaping Opinions*, Brill – Nijhoff.

- Haridakis Paul M., Hugenberg Barbara S., Wearden Stanley (eds.), (2009) War and the Media: Essays on news reporting, Propaganda and Popular Culture, McFarland.
- Hudson Miles, Stanier John, (1999) War and the Media : A Random Searchlight, NYU Press.

### 3.1 Ability Enhancement Compulsory Courses (AECC)

#### PAPER – 1

#### ENVIRONMENTAL SCIENCE

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Know about the Natural Resources both renewable and non renewable Resources.
- Learn about Environmental Pollution and its Types, Causes, Effects; and
- Identify the issues that impinge on our environment and adopt meaningful ways of mitigating and preventing ill effects on the environment.

#### CONTENTS

- i. Introduction to Environmental Studies** - Multidisciplinary nature of environmental studies. Scope and importance; Concept of sustainability and sustainable development.
- ii. Eco System** - What is an ecosystem? Structure and function of ecosystem; Energy flow in an ecosystem: food chains, food webs and ecological succession.
- iii. Natural Resources: Renewable and Non Renewable Resources**
- iv. Biodiversity and Conservation.**
- v. Environmental Pollution** - Types, Causes, Effects and Controls.
- vi. Environmental Policies and Practices: Acts and Protocols.**
- vii. Human Communities and the Environment.**

#### SUGGESTED READING

- Carson, Rachel, (2002) Silent Spring, (Fortieth Anniversary Edition) Houghton Mifflin, New York.
- Gleeson, B. and Low, N. (eds.) (1999) Global Ethics and Environment, Routledge, London.
- Groom, Martha J., Gary K. Meffe, and Carl Ronald Carroll, (2012) Principles of Conservation Biology, Sinauer Associates, Sunderland.

- Pepper, Ian L., Gerba, C.P. & Brusseau, M.L. (2011) Environmental and Pollution Science, Elsevier.
- Raven, Peter H., Hassenzahl, D.M. & Berg, L. R. (2015) Environment. 9th edition. John Wiley & Sons.
- Rosencranz, A., Divan, S., & Noble, M. L. (2001) Environmental law and policy in India, Oxford University Press, New Delhi.
- Sengupta, R. (2003) Ecology and economics: An approach to sustainable development. Oxford University Press.
- Sharma, P.D., (2007) Ecology and Environment. Rastogi Publication.
- Singh, J.S., Singh, S.P. and Gupta, S.R. (2014) Ecology, Environmental Science and Conservation, S. Chand Publishing, New Delhi.
- Sodhi, N.S., Gibson, L. & Raven, P.H. (eds). (2013) Conservation Biology: Voices from the Tropics, John Wiley & Sons.

**PAPER – 2**  
**ENGLISH/HINDI/MIL COMMUNICATION**

**(This paper can be made by the respective universities through their Board of under graduate studies depending upon their requirements e.g language etc.)**

## **C. Skill Enhancement Courses (SEC) (Compulsory) - (Any Two For Honours And Four For Regular Course)**

### **PAPER -1**

#### **STRATEGIC LEADERSHIP**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Know the concept of Strategic Leadership and Leadership Styles.
- Learn the importance of Team Building and Management; and
- Military Leadership and the Principles of Armed Forces Leadership besides, understanding the decision making processes of leaders at various points.

#### **CONTENTS**

- i.** Introduction to Strategic Leadership: Meaning and Significance.
- ii.** Leadership Styles.
- iii.** Behavioral Concepts – Individual Behaviour – Perception – Learning – Attitude Formation and Change – Motivation – Theories of Motivation – Personality Development.
- iv.** Interpersonal Behaviour – Communication – Leadership – Influencing Relations – Transactional Analysis.
- v.** Group Dynamics – Roles – Morale – Conflict – Groups – Inter-Group Behaviour – Inter-Group Collaboration and Conflict Management.
- vi.** Team Building and Management – Developing team resources – Designing team – Participation and Repercussion – Team building activities.
- vii.** Military Leadership: Meaning, attributes and Characteristics of Military Leadership
- viii.** The Principles of Armed Forces Leadership

#### **SUGGESTED READING**

- Aswathappa, (2007) Organisational Behaviour, Himalaya Publishing House, Mumbai
- Fred Luthans, Organizational Behaviour, (2007) Tata McGraw-Hill Publishing Co., New Delhi.

- Koontz Harold and O' Donnell Cyril, (2000) Essentials of Management, Tata McGraw-Hill Publishing Co., New Delhi.
- Newstorm J.W, and Keith Davis, (1995) Human Behaviour at Work, Tata McGraw-Hill Publishing Co., New Delhi.
- Robbins, Stephen P, (1996) Organisational Behaviour, 9th Edition, Prentice Hall of India, New Delhi.
- Stoner, James and Freeman Edward, (1989) Management, Prentice-Hall of India, New Delhi.

## PAPER – 2

**DEFENCE JOURNALISM**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Understand how the media whether print or visual shall report aspects of defence and national security for international community in general and state in particular.
- Differentiate between Civil Journalism & Defence journalism; and
- Media Ethics and Media Laws besides getting exposure to the practical aspects of defence journalism.

**CONTENTS****i. Introduction**

- a. Defence Journalism – Concept, meaning and features.
- b. Differences between Civil Journalism & Defence journalism.
- c. Defence Journalism – As a Profession

**ii. Defence News**

- a. Meaning and Defining Defence News
- b. Kinds of Sources of Defence News
- c. Defence Writing Procedure

**iii. Defence Reporting**

- a. Format languages and grammar
- b. Forms – Eye witness, computer assigned features
- c. Concept of Graphics and Animation (Role of Modern Technology)

**iv. Defence Terminology**

- a. Defence terms & Abbreviations
- b. Military terms – Weapons, Weapons system
- c. Defence organization – Rank and Rank structure in the services in India

**v. Problem in Defence writing**

- a. Media Ethics
- b. Media Laws
- c. Problem in Defence Writing – Political Pressure Official Secrecy – etc.,

**SUGGESTED READING**

- Bhatt, S.C., ( 2005) Practical Journalism, Aavishkar. Jaipur
- Chatterjee, R.K., (1973) Mass Communication, National Book Trust. New Delhi
- Dhara, R., (1945) Journalism, Industry Publishers. Calcutta.
- Waren ,K Agrie., (ed)., (1968) The Press and the Public Interest, Public Affairs Press. Washington, D.C.

**PAPER – 3**  
**GENERAL STUDIES/CURRENT AFFAIRS**

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Keep them updated with regard to current happenings besides learning static general knowledge.
- The course would help students to prepare for competitive examinations facilitating their career profile.

**CONTENTS**

- i. Topics of the Current affairs, general awareness in national and international significance.
- ii. General Knowledge Syllabus & Topics of the Indian and World history along with freedom movements in India.
- iii. GK Questions on Indian and world's geography, emphasizing on current issues, economical and social geography of India and the world, physical geographical aspects.
- iv. General Knowledge & Current Affairs topics of Indian Polity, Indian Constitution, Governance, Public Policy, Political System.
- v. GK Questions & Answers on the Economical and social development Topics, focus on the issues, remedies, policies and plans.
- vi. Environmental science, Biodiversity and Ecology related topics in General Knowledge/General Awareness & Current Affairs Sections in all competitions Exams.
- vii. Topics on the General sciences, science of regular usage and its applications.

**SUGGESTED READING**

Newspapers

Journals

Magazines

## PAPER – 4

### COMPUTER APPLICATIONS

**Learning Outcomes** - After undergoing this course a student will be in a position to –

- Characteristics of Computer, Generation of Computer and Application of Computers.
- The course helps students to format and create documents, presentations and the internet in practical applications.

### CONTENTS

- i. Computer - Characteristics of Computer, Generation of Computer and Application of Computers
- ii. Introduction to Windows - Creation of Folder, File / Folder – Delete, rename, copy etc.
- iii. Introduction to MS – Word - Document creation, save, open, and print the document, Cut, copy, paste, text find & replace, go to, clipboard and header footer.
- iv. Formatting – Page formatting, Paragraph formatting, and text formatting, Bullets & Numbering , Borders & Shading, Columns, Drop cap, Change case, and Background, Insertion - Page Numbers, Pictures, Date & time, Symbols, Text box, Symbols and hyperlink.
- v. Creation of tables, insertion of rows & columns, deletion of rows and columns, merging of rows and columns, split table and cells, sorting Mail merge, protection of documents and check the spelling and grammar.
- vi. MS – Power Point - Slide design, Slide layout, custom animation, slide transition and slide show. Insert new slides, duplicate slide, slide sorter and slide numbers
- vii. Introduction to Internet - Accessing website, Creation of e-mail, accessing of mail, and searching (only demonstration)

### SUGGESTED READING

- Katta G, Murty, (1992), Network Programming, Prentice Hall.
- Mather, M Paul (1991), Computer Application in Geography, John Wiley & Son.
- Shrivastava, Niranjana,(2010) Computer Application in Management, Wiley India.
- Kurose, F. James, Keith Ross, (2017) Computer Networking: A Top-Down Approach, Pearson.

- Shelly, B. Gary, Vermaat E. Misty, Carey Patrick (2014) Introduction to Computer Application and Concepts, Cenage.
- Castells, Manuel,(2002) The Internet Galaxy, Oxford University Press.

## PRACTICAL EXAMINATIONS

### SEMESTER I

1. **Maps:** Definition and Features; Classification and its utility for Military; Enlargement and reduction of Maps
2. **Conventional Signs: Military and Geographical**
3. **GRID System: Four Figure and Six figure Map References.**
4. **North:** Types of North and finding out True North; The Pole Star Method; The equal altitude method; Watch method & Compass method.
5. **Scale:** Definition, Methods of representing Scale: Inter-conversion of scale into Representative Fraction, construction of simple scale line and the comparative scale lines.
6. **SHORT PRESENTATION/ LECTURE**
7. **RECORD**
8. **VIVA VOCE**

## PRACTICALS

### SEMESTER II

1. **Bearing:** Definition, Inter conversion of Bearing in detail.
  2. **Liquid Prismatic Compass (LPC):** Features and functions of its various parts: Attempt following exercise on the LPC: To determine magnetic north; Setting of the Map.
  3. To find out the bearing of a point from other point situated on the ground.
  4. To determine one's and enemy's position on the map by resection and intersection methods with the help of compass.
- I. **SHORT PRESENTATION/ LECTURE.**
  - II. **RECORD.**
  - III. **VIVA VOCE**

## **PRACTICALS**

### **SEMESTER III**

1. Relief Features and their representation on the map.
2. Types of slopes and their representation on the map.
3. Gradient – Determination of gradients.
4. Inter visibility – Determination of inter visibility in case of rise or fall of slope.

#### **I. SHORT PRESENTATION/LECTURE**

#### **II. RECORD**

#### **III. VIVA VOCE**

## **PRACTICALS**

### **SEMESTER IV**

#### **1. Sand Model Exercises**

- a. Battle of Panipat, 1526 A.D.
- b. Battle of Assaye, 1803 A.D.

#### **2. Sketching of the Charts of Indian Battles**

- a. Battle of Zojilla, 1948.
- b. Battle of Thagla Ridge, 1962.
- c. Battle of Khem Karan, 1965.
- d. Battle of Shakargarh, 1971.
- e. Kargil Conflict, 1999

#### **3. Sketching of Charts of Western Battles**

- a. Battle of Trafalgar, 1805.
- b. Battle of Somme, 1919.
- c. Battle of El- Alamin, 1942.
- d. Arab-Israel War, 1967.

**Note – The respective university/college are at the liberty to choose or decide the nature of exhibit in a sand model as per the decision of Board of Studies in the discipline.**

## **PRACTICALS**

### **SEMESTER V**

1. **Thermal Imaging and Sensors.**
2. **Radars and its significance.**
3. **Introduction to Electronic Warfare in terms of Lasers, ECM, ECCM**
4. **Press Clippings on allotted current topics with a brief assignment**
5. **Field visit/project report**
6. **Educational Tour and its report.**

## **PRACTICALS**

### **SEMESTER VI**

1. **Strategic Maps of India:** India and her neighbours; Indian States and Union Territories with Capitals; Strategic Raw Materials and Defence Industries and Atomic Reactors.
2. **World:** World Map in 1945, Countries of NATO, Non-Aligned Countries, Countries of South Asia, South East Asia, Far East and West Asia; Nuclear Nations, Indian Ocean Littoral States and World Sea Routes.

#### **I. SHORT PRESENTATION/ LECTURE**

#### **II. RECORD**

#### **III. VIVA VOCE**

**Note – The students are to prepare a note book bringing out India/World Map as instructed by the instructor depicting the given outline in the paper.**

## 11. Teaching – Learning Process in Defence and Strategic Studies (Honours/Regular Course)

- 11.1 Well-written learning objectives can give students precise statements of what is expected of them and provide guidelines for assessing student progress. Clearly defined objectives form the foundation for selecting appropriate content, learning activities, and assessment measures. If objectives of the course are not clearly understood by both instructor and students, if your learning activities do not relate to the objectives and the content that you think is important, then your methods of assessment, which are supposed to indicate to both learner and instructor how effective the learning and teaching process has been, will be at best misleading, and, at worst, irrelevant or unfair.
- 11.2 The core papers 'War and its Various Aspects' and 'Military History of India' are the foundation courses for the student of Defence and Strategic Studies enabling them to understand the basic conceptual aspects of war. It will also help them to understand the basic causes of war and various types of war i.e. economic warfare, psychological warfare and economic warfare in detail.
- 11.3 Throughout the long military history of ancient India foreign invasion would be reoccurring, but most warfare was between Indian Kingdoms. The formidable Himalayas largely separate India from the rest of Asia leaving the many kingdoms of ancient India to battle for dominance. The paper 'Military History of India focuses on the battles fought in India, their causes and consequences in detail. This paper includes the prominent battles like battle of Hydaspes, Tarain, Panipat, and will acquaint students with Mughal art of war, Maratha art of war and Military system of the Sikhs.
- 11.4 India needs a National Security Strategy urgently. The world is changing very fast. New security challenges have arisen. In the absence of a coherent strategy, the government's responses will remain ad hoc and partial. The core course also includes the papers like 'International Relations', 'National Security' and Security problems related to India which will enable the students to know the defence aspects of

International relations and conceptual aspects of national security and especially the national security problems both internal and external.

11.5 The paper 'India's Maritime Security' covers the various threats emerging from the sea and impacting Indian naval security. The environment in which India has to consider its maritime security includes the high seas in the northern Indian Ocean and the maritime zones which include ports and territorial waters. The territorial waters are the areas where India possesses complete sovereign rights and extends right up to the limits of the Exclusive Economic Zone (EEZ) and Continental Shelf. Apart from this, the economic, political and strategic stakes of India will be covered in detail. Besides, regional Security and Cooperation focuses on the regional issues and efforts made by the states for bilateral and multi lateral cooperation for security and cooperation.

11.6 The core papers like 'Science, Technology and National Security' and 'Economic Aspects of India's National Security' are focused to acquaint the students about the role played by S&T in the defence of the nation and how principles of economics are applied in security of the nation and how economic issues have become more relevant in the wars of 21<sup>st</sup> century.

11.7 India's National Security Environment is determined by its geographical attributes, historical legacy, socio-economic circumstances as well as regional and global developments. The core paper 'Contemporary Strategic Environment in India' is related to contemporary security challenges being faced by India and how India is trying to acquire the status of regional power and world power. The aim of the paper is disseminate the knowledge for civil services aspirants. Besides, role of armed forces in dealing with the threats has also been focused.

11.8 Geography has always played an important role in the security of a nation. This paper is about the specific contributions which geography and contemporary military geography might make to the broader critical military studies project. A sub-discipline identifying itself as military geography emerged towards the end of the nineteenth century consolidating these endeavors around a specific objective, that of explicitly applying the tools and techniques of geographical inquiry (both physical and human) to assist in the

pursuit of military objectives. Therefore, the paper 'Geo-politics and Military Geography' is especially focused on the geo political and military geographical aspects of the national security strategy of a nation and India especially.

11.9 **Tutorials-** For facilitating better absorption of concepts and syllabus requirements, the teachers can also offer tutorials that are specifically designed to help students gain sufficient knowledge of basic concepts and ideas.

11.10 All the above mentioned methods are participatory and offer a student-based learning process and the teaching could thus become enjoyable and interactive.

11.11 The development of practical skills will constitute an important aspect of the teaching-learning process. A variety of approaches to teaching-learning process shall include:

11.11.1 Guest lecturers – Practitioners, academia, researchers and other professionals are invited to talk on a particular topic related to Defence & Strategic Studies.

11.11.2 Seminars – Groups of individuals within the University or from other institutions are brought to discuss several aspects of a particular subject of topical interest.

11.11.3 Tutorials – Additional help from the teachers is offered to clarify concepts and ideas.

11.11.4 Workshops – enabling the exchange of ideas on a particular theme.

11.11.5 Peer teaching and learning – identifying senior students or student friends who can offer additional insight into the subject.

11.11.6 Practicum – Sand modeling and map making are vital for clear understanding of a host of issues

11.11.7 Project and field-based learning – Students completing projects that employ technical skills and test writing ability and frequent field visits could form a vital portion of learning methodology.

- 11.11.8 Open-ended project work – allowing students to choose topics of their own interest in the course of study and presenting using multimedia or as written report can be effective.
- 11.11.9 Technology-enabled learning – Swayam, MOOCs and other web based curricula can be introduced to students who can benefit from Information technology.
- 11.11.10 Interaction with Defence personnel and research establishments etc. – A unique opportunity for students of Defence & Strategic Studies is the opportunity to meet practitioners especially defence personnel as guest lecture, motivational component or personal account of experience in the armed forces. Think tanks and other research establishments offer internships that can serve as significant training ground for future careers.
- 11.11.11 In addition, problem-solving skills and higher-order skills of reasoning and analysis will be encouraged among students for personality building. The recommended use of prescribed text books and e-learning resources and others self study materials including increasing use of team based activities and interactions will be designed to promote the development of students and teachers alike.
- 11.11.12 Such detailed outpouring by students on new conceptualization will indeed make them feel more aggressive in knowing the subject; confident, more talented and articulate in communication and sharing of thoughts, also acquire better market potential and competitive in outlook, besides reposing faith in country's higher education system.

## 12. Assessment Methods

12.1 An evaluation of student's achievement in Defence and Strategic Studies will be aligned with the course/program learning outcomes and the academic and professional skills that the programme is designed for. A variety of determining methods that are appropriate within the disciplinary area of any other related subject will be tried. Since the subject has also practical examination, the added assessment oral and written, closed-book and open-book tests; practical assignments/report writings, viva voce examinations and interviews etc can be used.

12.2 While the principal assessment method could be written assessment, oral tests could also be administered. Seminars could form part of the assessment where the student's ability to conceive a topic, present it in a cogent manner, use of technology to illustrate the topic and arguments and counter arguments about the seminar subject can be employed. Open book tests encourage the student to source arguments and substantiate them.

12.3 The candidates will also be evaluated on the basis of field visits, contemporary strategic environment evaluations, outputs from collaborative work, portfolios on field visits activities undertaken.

### **13.Key Words**

LOCF, Bachelor Programme, Defence, Strategic, Security, Warfare, National Security, Defence Economics, Psychology, Sociology, Military History, Human Rights, Law, Nuclear, Geo Politics, Strategic Leadership, Research, Media, Journalism, Cyber, Technology, WMD's, Disarmament, Proliferation, Disaster, Maritime, Region, Remote Sensing, Computers, Knowledge, Thought

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**THIRUVALLUVAR UNIVERSITY**

**BACHELOR OF ARTS**

**B.A. DEFENCE AND STRATEGIC STUDIES**

**DEGREE COURSE**

**CBCS PATTERN**

**(With effect from 2012-2013)**

**The Course of Study and the Scheme of Examinations**

S.No.	Part	Study Components		Ins. hrs /week	Credit	Title of the Paper	Maximum Marks		
		Course Title					CIA	Uni. Exam	Total
<b>SEMESTER I</b>							<b>CIA</b>	<b>Uni. Exam</b>	<b>Total</b>
1	I	Language	Paper-1	6	4	Tamil/Other Languages	25	75	100
2	II	English	Paper-1	6	4	English	25	75	100
3	III	Core Theory	Paper-1	5	4	Fundamentals of War and Peace	25	75	100
4	III	Core Theory	Paper-2	4	3	Defence Mechanism of India	25	75	100
5	III	ALLIED -1	Paper-1	7	4	Outlines of Political Theory I	25	75	100
6	IV	Environ. Studies		2	2	Environmental Studies	10	40	50
				<b>30</b>	<b>21</b>		<b>135</b>	<b>415</b>	<b>550</b>
<b>SEMESTER II</b>							<b>CIA</b>	<b>Uni. Exam</b>	<b>Total</b>
7	I	Language	Paper-2	6	4	Tamil/Other Languages	25	75	100
8	II	English	Paper-2	4	4	English	25	75	100
9	III	Core Theory	Paper-3	5	4	The Art of Warfare in India upto 15 <sup>th</sup> Century	25	75	100
10	III	Core Theory	Paper-4	4	3	World Military History – I (4 <sup>th</sup> Cent. BC to 19 <sup>th</sup> Century)	25	75	100
11	III	ALLIED-1	Paper-2	7	6	Outlines of Political Theory II	25	75	100
12	IV	Value Education		2	2	Value Education	10	40	50
13	IV	Soft Skill		2	1	Soft skill	10	40	50
				<b>30</b>	<b>24</b>		<b>145</b>	<b>455</b>	<b>600</b>
<b>SEMESTER III</b>							<b>CIA</b>	<b>Uni. Exam</b>	<b>Total</b>
14	I	Language	Paper-3	6	4	Tamil / Other Languages	25	75	100
15	II	English	Paper-3	6	4	English	25	75	100
16	III	Core Theory	Paper-5	3	3	The Art of Warfare in India since 15 <sup>th</sup>	25	75	100

## B.A. Defence and Strategic Studies: Syllabus (CBCS)

S.No.	Part	Study Components		Ins. hrs /week	Credit	Title of the Paper	Maximum Marks		
		Course Title							
						Century			
17	III	Core Theory	Paper-6	3	3	World Military History – II (19 <sup>th</sup> Century to World War – II)	25	75	100
18	III	ALLIED-2	Paper-3	7	4	General Economics I	25	75	100
19	IV	Skill based Subject	Paper-1	3	3	Introduction to Journalism	15	60	75
20	IV	Non-major elective	Paper-1	2	2	Fundamentals of defence and strategic studies	10	40	50
				<b>30</b>	<b>23</b>		<b>150</b>	<b>475</b>	<b>625</b>
<b>SEMESTER IV</b>									
							<b>CIA</b>	<b>Uni. Exam</b>	<b>Total</b>
21	I	Language	Paper-4	6	4	Tamil/Other Languages	25	75	100
22	II	English	Paper-4	6	4	English	25	75	100
23	III	Core Theory	Paper-7	3	3	International Relations and Organizations	25	75	100
24	III	Core Theory	Paper-8	3	2	Limited Wars	25	75	100
25	III	ALLIED-2	Paper-4	7	6	General Economics II	25	75	100
26	IV	Skill based Subject	Paper-2	3	3	News and News Contents	15	60	75
27	IV	Non-major elective	Paper-2	2	2	National Security of India	10	40	50
				<b>30</b>	<b>24</b>		<b>150</b>	<b>475</b>	<b>625</b>
<b>SEMESTER V</b>									
							<b>CIA</b>	<b>Uni. Exam</b>	<b>Total</b>
28	III	Core Theory	Paper-9	6	5	Armed Forces and Society	25	75	100
29	III	Core Theory	Paper-10	6	4	Strategic Thought	25	75	100
30	III	Core Theory	Paper-11	6	4	Nuclear Warfare	25	75	100
31	III	Core Theory	Paper-12	6	4	Defence Economics	25	75	100
32	III	Elective	Paper-1	3	3	(to choose any 1 out of 3) A. Warfare in Independent India B. Military Geography C. Essentials of Public Administration	25	75	100
33	IV	Skill based Subject	Paper-3	3	3	News Writing Procedure and News Story	15	60	75
				<b>30</b>	<b>23</b>		<b>140</b>	<b>435</b>	<b>575</b>
<b>SEMESTER VI</b>									
							<b>CIA</b>	<b>Uni. Exam</b>	<b>Total</b>
34	III	Core Theory	Paper-13	7	5	National Security of India	25	75	100
35	III	Core Theory	Paper-14	7	5	International Law	25	75	100

## B.A. Defence and Strategic Studies: Syllabus (CBCS)

S.No.	Part	Study Components		Ins. hrs /week	Credit	Title of the Paper	Maximum Marks		
		Core Theory	Paper-15						
36	III	Core Theory	Paper-15	7	5	Arms Control and Disarmament	25	75	100
37	III	Elective	Paper-2	3	3	(to choose any 1 out of 3) A. Specialised Warfare B. Warfare and Technology C. Elementary Study of the Constitution of India	25	75	100
38	III	Elective	Paper-3	3	3	Defence Management	25	75	100
39	IV	Skill based Subject	Paper-4	3	3	Basics of Defence Journalism	15	60	75
40	V	Extension Activities		-	1		50	-	50
		<b>TOTAL</b>		<b>30</b>	<b>25</b>		<b>190</b>	<b>435</b>	<b>625</b>

Part	Subject	Papers	Credit	Total credits	Marks	Total Marks
Part I	Languages	4	4	16	100	400
Part II	English	4	4	16	100	400
Part III	Allied (Odd Semester)	2	4	8	100	200
	Allied (Even Semester)	2	6	12	100	200
	Electives	3	3	9	100	300
	Core	15	(3-7)	57	100	1500
Part IV	Environmental Science	1	2	2	50	50
	Soft skill	1	1	1	50	50
	Value Education	1	2	2	50	50
	Lang. & Others/NME	2	2	4	50	100
	Skill Based	4	3	12	75	300
Part V	Extension	1	1	1	50	50
	<b>Total</b>	<b>40</b>		<b>140</b>		<b>3600</b>

**THIRUVALLUVAR UNIVERSITY  
VELLORE**

**B.A DEFENCE AND STRATEGIC STUDIES**

**SYLLABUS  
CBCS PATTERN  
(With effect from 2012-2013)**

**SEMESTER – I**

**PAPER – 1**

**UNDAMENTALS OF WAR AND PEACE**

**Objective:**

The history of mankind is highlighted by incidents of war and peace. It is therefore necessary to have indepth knowledge of these concepts for better understanding and clarity.

**Unit – 1: Conceptual Formulation**

- a) Meaning and definition of Defence and Strategic Studies – Its relevance and significance.
- b) Subject content of Defence and Strategic Studies – Its features and relationship with other disciplines of study.
- c) Definition and meaning of basic concepts – War, Campaign, Battle, Strategy, Tactics, Security, and Defence.

**Unit – 2: History of Warfare**

- a) Historical evolution of warfare – feature of warfare at various historical stages – its contemporary features.
- b) Causes of warfare.
- c) Principles of warfare

**Unit -3: Typology of Warfare**

- a) Conventional and unconventional wars – civil wars, nationalist war, guerilla war, insurgency, limited war & total war.
- b) ABC warfare – Atomic, Biological & Chemical warfare.
- c) High – tech warfare, electronic warfare, cyber warfare.

**Unit – 4: Peace Conceptual Formulations**

- a) Concept of peace – meaning and definition, typology of peace.
- b) Peace movements: Anti nuclear Movements – CND etc,
- c) Zones of peace and nuclear free zones.

**Unit – 5: Mechanics of Peace**

- a) Settlement of international disputes [Amicable]; ICJ.
- b) Peace keeping Operations.
- c) Peace Building, Peace Making, and Peace Research.

**REFERENCES**

- 1) Philip, T.R., (ed), Roots of Strategy, 1943.
- 2) Michael Howard, (ed), The Theory and Practice of War, 1965.
- 3) D.G.Chandler, The Atlas of Military Strategy: the art, theory and practice of war (London, 1980)
- 4) Fuller, J.F.C., The Foundation of the Science of War (London, 1925)
- 5) Field Marshal, Montgomery, Viscount., A History of Warfare, (London:Collins,1968).
- 6) Galtung, Johan., The Struggle for Peace, (Ahamedabad: Gujarat Vidyapeeth,1986).

**PAPER – 2**

**DEFENCE MECHANISM OF INDIA**

**OBJECTIVE:** The Defence of a country is structured on certain organizational pattern and mechanism. It is therefore essential to have a basic knowledge of them in the correct of India.

**Unit – I: The Indian Defence Forces**

- a) Rank Structure of the Three Services.
- b) Recruitment methods for Defence Services.
- c) Important training Institution of the Three Services.
- d) Second line defence [introduction of BSF, CG, CISF, RR]

**Unit – 2: Higher Defence Organizations of India**

- a) Power of the President of India in relation of Defence.
- b) Role and function of Ministry of Defence.
- c) Composition and function of Defence Committees/NSC.
- d) Chief of Staff and joint service Organization.

**Unit – 3: Army Organization**

- a) Organization of army Headquarters {role of COAS and PSOs}.
- b) Static and Field formation of Indian Army.
- c) Arms and Services.
- d) Weapons of Indian Army.

**Unit – 4: Air Force Organization**

- a) Organization of Air Force Headquarters {role of CAS and PSOs}.
- b) Static and Field formation of Indian Air Force.
- c) Types of Aircrafts.

**Unit – 5: Navy Organization**

- a) Organization of Naval Headquarters {role of CNS & PSOs}.
- b) Static and Field formation of Indian Navy.
- c) Types of Warships.

**REFERENCES**

- 1) Venkateswaran, A.L., Defence Organisation in India, New Delhi: Government of India, 1967.
- 2) Government of India, The Army of India and its Evolution, Calcutta, 1924.
- 3) Ministry of Defence, Government of India, Indian Armed Forces Year Book, (Annual).
- 4) Palit, D.K., Essentials of Military Knowledge, (New Delhi:1989)
- 5) Singh, Nagendra., Defence Mechanism of Modern State, (New Delhi:1967).

**ALLIED – 1**

**PAPER – 1**

**OUTLINES OF POLITICAL THEORY I**

**Objectives**

This paper tries to

1. Give an introduction to the discipline of Political Science;
2. Sketch various forms of States;
3. Point out the origin of States;
4. Point out the importance of Law, Equality and Liberty;
5. Examine the spheres of State activity

**UNIT-I: Introduction**

1. Nature, Scope and Importance of Political Science
2. Evolution of Political Science
3. Methodology of Political Science
4. Political Science and Social Sciences
5. Art and Science of Political Science.

**UNIT-II: State**

1. Elements of the State
2. Sovereignty
3. Nation-States
4. Democratic States
5. Non-Democratic States

**UNIT-III: Origin of the State:**

1. Divine Right Theory
2. Force Theory
3. Patriarchal Theory
4. Matriarchal Theory
5. Evolutionary Theory
6. Social Contract Theory.

**UNIT-IV: Law**

1. Nature of law
2. Sources of law
3. Kinds Of law
4. Law and Morality

**UNIT-V: Liberty and Equality**

1. Meaning of Liberty
2. Safeguard of Liberty
3. Law and Liberty
4. Meaning and types of Equality
5. Equality in Modern States
6. Equality and Liberty
7. Sphere of State Action (Economic, Social and Cultural)

**REFERENCE BOOKS**

1. Amal Roy and Mohit Bhattacharya : *Political Theory: Ideas and Institutions*, The World Press, Calcutta, 2002.
2. J.C.Johari : *Principles of Modern Political Science*, Sterling, New Delhi, 1999.
3. A.C.Kapoor : *Principles Of Political Science*, S.Chand & Co., New Delhi, 2000.

**SEMESTER - II**

**PAPER – 3**

**THE ART OF WARFARE IN INDIA UP TO THE 15<sup>TH</sup> CENTURY**

**OBJECTIVE:** This paper attempts to familiarize the students with evolution of art of warfare in India. It is to establish that the art of warfare changes with changes in political governance, nature of threat, and weapon systems,

**UNIT – I: Warfare in Ancient India**

- a) Types of war during Vedic period.
- b) Alexander’s invasion of India (battle of Hydaspas).
- c) Causes of India’s defeat.

**UNIT – II: Military System of the Mauryan Period**

- a) Battle of Kalinga and its significance.
- b) Military organizations of Maurayas
- c) Kautilya’s Arthashastra philosophy on war, peace, fort, espionage, diplomacy.

**UNIT – III: Military System of the Gupta Period**

- a) Introduction of Gupta rulers
- b) The Guptan military organization
- c) Military organization of Harshavardhana

**UNIT – IV: Rajput Military System**

- a) Rajput challenge to Arab conquest [battle of Rawar]
- b) Md Ghori’s conquest of India [battle of Terrain I & II]
- c) Causes of Rajput failures in the middle ages.

**UNIT – V: Military System in South India.**

- a) Political powers of south India in the medieval period.
- b) Military organization of the Pallava rulers
- c) Military achievements of the Chola emperors.

**REFERENCES**

- 1) Majumdar, R.C., An Advanced History of India, New York: St.Martin,1967.
- 2) Malleson, G.B., The Decisive Battles of India, London:W.H.Allen,1885

- 3) Saxena, K.L.M., Military System of India-1850-1900, Delhi'1976.
- 4) Roy, Koushik., From Hydespas to Kargil : A History of Warfare in India from 326 B.C. to A.D 1999, Delhi: Manohar,2004.
- 5) Anjoli Nirmal, The Decisive Battles of Indian History, Jaipur: Pointer Publications,1999.
- 6) Sarkar, Jadunath., Military History of India, Bombay: Orient Longmans,1970.
- 7) Das, S.T., Indian Military: Its History and Development, Allahabad: Kitab Mahal,1979.
- 8) V.R.R. Dikshitar, Wars in Ancient India, 1948.

**PAPER – 4**

**WORLD MILITARY HISTORY – I**  
**(4<sup>th</sup> Century BC to 19<sup>th</sup> Century AD)**

**Subject Description:** This paper outlines the wars which were fought from 4<sup>th</sup> century BC to 19<sup>th</sup> Century AD.

**Goals:** To make the students understand the evolution of wars in the world from early period.

**Objective:** On successful completion of the paper, the candidates will be able to a recite the evolution of warfare from early times.

**Unit – I: Greek warfare**

- a) Military system of the Greeks
- b) Greco – Persian wars – with special reference to the Battles of Marathon, Thermopyle and Salamis.
- c) Peloponnesian wars

**Unit – 2: Roman Warfare**

- a) Military System of the Romans
- b) Punic wars ( Battle of Cannae and Zama)
- c) Campaigns of Julius Caesar

**Unit – 3: Warfare in the Middle Ages.**

- a) Crusades – Age of Valour
- b) Mongol Military System
- c) Advent of gun powder and its impact on warfare.

**Unit – 4: Warfare During 16<sup>th</sup> and 17<sup>th</sup> Centuries**

- a) Development of weapons during 16<sup>th</sup> and 17<sup>th</sup> centuries
- b) Reforms of Gustavus Adolphus
- c) Siege craft and fortification – Vauban
- d) Rise of Professional Armies and Navies.

**Unit – 5: Napoleonic warfare.**

- a) French Revolution – causes and outcome.
- b) Rise of Napoleon.
- c) Napoleon’s Art of Warfare.

- d) Battles of Trafalgar and Waterloo

**REFERENCES**

- 1) Howard, Michael., War in European History, Oxford: Oxford University Press,1977.
- 2) Keegan, John., A History of Warfare, New York: Vintage,1993.
- 3) Fuller, J.F.C., A Military History of the Western World, New York: Funk & Wagnalls Company,1955.
- 4) Neilberg, Michael,S., Warfare in World History, London / New York : Routledge,2001.
- 5) Andre Corviser, (ed.), A Dictionary of Military History, Oxford: Blackwell Publishers,1994.
- 6) Dupey & Dupey, Encyclopeadia of Military History.

**ALLIED – 1**

**PAPER – 2**

**OUTLINES OF POLITICAL THEORY II**

**Objectives**

This paper tries to

1. Sketch the features of democratic States
2. Outline the structure and function of the legislative
3. Outline the structure and function of the Executive
4. Outline the structure and function of the Judiciary
5. Describe the linkages in democratic State.

**UNIT-I: Democratic State**

1. Definitions of Democracy
2. Representative Democracy
3. Direct Democratic Devices
4. Theories of Representation
5. Elections

**UNIT-II: Legislature**

1. Functions of Legislature
2. Theories of Suffrage
3. Constituencies
4. Unicameral Legislature
5. Bicameral Legislature

**UNIT-III: Executive**

1. Parliamentary Executive
2. Presidential Executive
3. Collective Executive
4. Dictatorship
5. Military Governance
6. Executive Functions

**UNIT- IV: Judiciary**

1. Functions of the Judiciary
2. Independence of the Judiciary
3. Rule of Law
4. Administrative Law
5. Judicial Activism
6. Alternative Disputes Mechanism

**UNIT-V: Political Participation**

1. Political Parties
2. Public Opinion
3. Pressure Groups
4. Mass Media
5. Electronic Media

**Reference Books**

1. Amal Roy and Mohit Bhattacharya : *Political Theory: Ideas and Institutions*, The World Press, Calcutta, 2002.
2. J.C.Johari : *Modern Constitutions*, S.Chand & Co. New Delhi, 1990.

**SEMESTER - III**

**PAPER – 5**

**THE ART OF WARFARE IN INDIA SINCE THE 16<sup>TH</sup> CENTURY**

**OBJECTIVE:** With the introduction of gun powder in the west, the art of warfare in India entered into professionalism with mughals, Marathas and Sikhs. This paper aims to offers a broader understanding of these aspects.

**UNIT – I : Military Systems of the Mughals**

- a) Foundation of the Mughal empire [Battle of Panipat I ]
- b) Consolidation of the Empire [Battle of Panipat II]
- c) The Mughal military organization, weapon system, art of war.

**UNIT – II: The Maratha Military System**

- a) The military organization of Shivaji
- b) Development of guerilla warfare and its characteristics.
- c) The Maratha Navy under Kanohji Angre.

**UNIT- III: The Sikh Military System**

- a) Rise of Sikhism and its philosophy.
- b) Guru Govind Singh’s Khalsa Panth.
- c) The Military Organizations of the Sikhs under Maharaja Ranjit Singh.

**UNIT – IV: The Advent of Europeans in India**

- a) The early settlers of Europeans.
- b) Conquest of Bengal [Battle of Plassey].
- c) The rise of Presidency Armies.

**UNIT – V: British Conquest of India.**

- a) The decline of the Marathas [Battle of Panipat III]
- b) The first war of Independence, the Great Mutiny 1857.
- c) The Military reforms under the Crown.

**REFERENCES**

- 1) Majumdar,R.C., An Advanced History of India, New York: St.Martin,1967.
- 2) Malleson, G.B., The Decisive Battles of India, London:W.H.Allen, 1885
- 3) Saxena,K.L.M., Military System of India-1850-1900, Delhi'1976.

## ***B.A. Defence and Strategic Studies: Syllabus (CBCS)***

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- 4) Roy, Koushik., From Hydespas to Kargil : A History of Warfare in India from 326 B.C. to A.D 1999, Delhi: Manohar, 2004.
- 5) Anjoli Nirmal, The Decisive Battles of Indian History, Jaipur: Pointer Publications,1999.
- 6) Sarkar, Jadunath., Military History of India, Bombay: Orient Longmans,1970.
- 7) Das, S.T., Indian Military: Its History and Development, Allahabad: Kitab Mahal,1979.
- 8) V.R.R. Dikshitar, Wars in Ancient India,1948.

**PAPER – 6**

**WORLD MILITARY HISTORY – II  
(19<sup>th</sup> Century to World War II)**

**Subject Description:** This Paper aims at informing the students the causes and conduct of war from 19<sup>th</sup> century to world war – II

**Goals:** To make the students learn about the wars that were fought from 19<sup>th</sup> century to World War – II.

**Objective:** On completion of the paper, the students will be in a position to analyse the cause for war in modern period.

**Unit – 1: American Military Experience**

- a) American war of Independence – 1776 – 1782
- b) American Civil war – 1861 – 1865
- c) Spanish American war – 1898 – 1900.

**Unit – 2: World War – I**

- a) Causes
- b) Trench warfare
- c) Mobile warfare – Battles of Somme and Cambrai.

**Unit – 3: Development of warfare during inter war period**

- a) Land Warfare
- b) Sea Warfare
- c) Air Warfare.

**Unit – 4: World War – II**

- a) Causes
- b) Development of armored warfare
- c) Blitzkrieg attack.

**Unit – 5: World War – II**

- a) Desert warfare
- b) Role of Naval power – Battle of Midway
- c) Role of Air power – Battle of Britain
- d) Consequences

**REFERENCES**

- 1) Reid, Brain Holden, *The Origin of the American Civil War*, (London,1996).
- 2) Parish, Peter., *The American Civil War*, (London:1975).
- 3) Falls, Cyril, *The First World War* ( London:1960)
- 4) Strachan, Hew (ed)., *The Oxford Illustrated History of the First World War* ( Oxford: 1998)
- 5) Dupey & Dupey., *Encycloepadia of Military History*.
- 6) Posen,B.R., *The Sources of Military Doctrine*,( Ithaca: Cornell University Press,1984)
- 7) Fuller, J.F.C., *The Decisive Battles of the Western World*, (London: 1970).

**ALLIED – 2**

**PAPER – 3**

**GENERAL ECONOMICS I**

**Objective:**

To provide a frame work of knowledge relating to the concepts and practice of Economics in Indian context and to make the students understand the application of Economic principles in the strategic sector. Also, to provide insight on the most pressing issue “Demand for Defence Expenditure” i.e. the right size of defence budget.

**UNIT – I**

Economic Analysis - Basic Problems of an Economy - Economic Systems - Capitalism - Socialism - Mixed Economy - Communalism - Role of Government.

**UNIT – II**

Concept and Management of National Income - Problems of measurement - Trends in National Income under Plans.

**UNIT – III**

Market Mechanism - Law of Demand and Supply - Elasticity of Demand - Elasticity Measurement - Uses - Limitations.

**UNIT - IV**

Market Forms - Perfect Competition - Monopoly - Discriminative Monopoly - Monopolistic Competition - Wastes of Monopolistic Competition.

**UNIT – V**

Defence Economics - Economics of Conflict and Terrorism - Scope and Definition - Micro and Macro Economic impact - Disarmament and Peace.

**SKILL BASED SUBJECT**

**PAPER – 1**

**INTRODUCTION TO JOURNALISM**

**Objective:** This provides background to the source. The History of Journalism is provided as a backdrop, against which the emergence of Press Council of India (PCI) is outlined

**Unit - I: Basics of Journalism**

- a) Meaning, Definition and the concept of Journalism
- b) Qualities of a Journalism
- c) Ethics of Journalism

**Unit - II: Journalism – History and Trends**

- a) Growth and milestones in Journalism
- b) Industrialization of the press : 1880 – 1920
- c) Electronics and electronic changes : 1920 – 1950

**Unit – III: The Press Council of India**

Emergence of the press council of India  
Powers and functions of the press council of India  
Role of the press council in India

**Unit – IV: Press Freedom and the Governments**

- a) James Augustus Hicky and Bengal Gazette
- b) Press and Freedom Struggle
- c) Press Freedom since Independence

**Unit – V: Terminology of Modern Journalism**

**REFERENCES**

- 1) Menon, P.K., Practical Journalism, Jaipur : Aavishkar Publishers & Distributors, 2005.
- 2) Dhara,R., Journalism, Calcutta : Industry Publishers,1945.
- 3) Basu, R.N., Handbook of Journalism, Jaipur: Pointer Publishers, 2005.
- 4) Kamath,M.V., The Journalist's Handbook, New Delhi : Vikas,1980.
- 5) -----, Professional Journalism, New Delhi: Vikas, 1983.

**NON MAJOR ELECTIVE**

**PAPER – 1**

**FUNDAMENTALS OF DEFENCE AND STRATEGIC STUDIES**

**Objective:** To introduce the discipline of Defence and Strategic Studies – its subjects contents – Contemporary Relevance; Importance to contemporary world development and relationship – the goals of the discipline

**Unit – I: Introduction and Conceptual Formulations**

- a) Introduction to the discipline of Defence and Strategic Studies – Subjects contents – relationship with other disciplines – relevance and significance
- b) Basic Concepts of War, battle, Campaign etc.
- c) Definition of Security, Defence, Strategy, Peace etc

**Unit – II: History of Warfare**

- a) Historical Evolution of Warfare – its features and significance
- b) Principles of War, Causes of War, Function of War;
- c) Types of War – and Scope

**Unit – III: Basic of International Relations**

- a) Nature and Scope of International Relations; Features of International Political System- Structure of international Political System (Uni, Bi & Multi Polar)
- b) Actors in International Political System – State and Non – State actors; World government (UNO)
- c) Security features in International Political system – Collective security, Balance of power, Hegemony, Regionalism, etc.

**Unit – IV: Introduction to Peace**

- a) Meaning and Definition of peace; typology and peace;
- b) Approaches to peace – Disarmament, International Law;
- c) Peace movement, peace research, peace-making, peace building, peace keeping.

**Unit – V: Mechanics of Peace**

- a) Role and function of International organizations – League of Nations, UNO;
- b) Amicable means to settle Inter-state conflicts;
- c) Diplomacy-Scope & Function; type of diplomacy – its features.

**REFERENCES**

- 1) Field Marshal Montgomery, Viscount., A History of Warfare, London: Collins,1968.
- 2) Palmer, N.D. and H.C. Perkins, International Relations, Boston: Houghton Mifflin, 1953.
- 3) Margenthau, H.J., Politics among Nations: The Struggle for Power and Peace, Calcutta: Scientific Book Agency' 1972.
- 4) Waltz, K., Man, the State, and War: A Theoretical Analysis, New York: Columbia University Press, 1959.
- 5) Johan, Galtung., The Struggle for Peace, Ahmedabad : Gujarat Vidhya Peeth, 1985.
- 6) Chopra, Jarat (ed), The Politics of Peace - Maintenance, New York: 1998.

**SEMESTER - IV**

**PAPER – 7**

**INTERNATIONAL RELATIONS AND ORGANIZATIONS**

**OBJECTIVE:** In the contemporary world the survival of the mankind is conditioned by the facts of war and peace. The conditions of war and peace are influenced by various actors, viz., State, non-state and international organizations. This paper introduces the students to all these factors.

**Unit-1: Introduction–Definition – Meaning – Scope of International Relations**

- a. State, Nation, Nation-state, Concepts, Features and Scope.
- b. National Power – Components of National Power – its scope.
- c. Approaches' to international relations- Mainstream theories-Idealist and realist.

**Unit-II Power Systems in International Relations**

- a. International Power Structure – Definition, Meaning, and Scope- Uni polar, Bi Polar & Multi Polar.
- b. Balance of Power – Meaning and Definition – Characteristics of Balance of Power; techniques of Balance of Power.
- c. Collective Security.

**Unit –III: Diplomacy and Foreign Policy**

- a. Diplomacy- Meaning, Definition, Objectives and Scope & Types of Diplomacy
- b. Foreign Policy- Meaning, Definition, Determinants of Foreign Policy
- c. National Interest- Meaning and Definitions.

**Unit- IV: International Organization and Scope**

- a. International Organization – Origin, Growth & Functions
- b. The League of Nations – Origin, Organization, functions – failure of the League of Nations.
- c. The U N O – Origin, Aim, Structure, Scope and Functions.

**Unit - V: Regional Organization**

- a. Origin, Development and functions of Regional Organizations- Its relevance and utility.
- b. S A A R C – Origin, Objectives, Development and Functions.
- c. ASEAN- Origin, Objectives, Developments and Functions.
- d. Basic understanding of the E U.

**REFERENCES**

- 1) Palmer, N.D. and H.C.Perkins, International Relations, Boston: Houghton Mifflin,1953.
- 2) Jackson, R. and G.Sorensen, Introduction to International Relations: Theory and Approaches, Oxford: Oxford University Press, 2003.
- 3) Frankel, J., International Relations in a Changong World, London: Oxford University Press, 1977.
- 4) Nicholson,M., International Relations : A Concise Introduction, New York : Palgrave,2002.
- 5) Chatterjee, Aneek., International Relations Today : Concept and Applications, New Delhi: Pearson,2010.
- 6) Johari, J.C., International Relations and Politics, New Delhi: Sterling Publishers,1985.

**PAPER – 8**

**LIMITED WARS**

**Subject description:** This paper deals with the evolution of limited wars after the end of World War – II

**Goals:** To make the students learn about some of the important wars that were fought after 1945.

**Objective:** After going through this paper students will have an understanding of wars that were fought after the end of World War – II

**Unit – 1: Korean War**

- a) Concept, meaning and scope of limited wars
- b) Causes of Korean war
- c) Main events
- d) Role of UNO

**Unit – 2: Vietnam War**

- a) Causes
- b) Main events
- c) Lessons learnt

**Unit – 3: Arab Israeli Wars, 1967 & 1993**

- a) Causes
- b) Main events
- c) Role of Air power
- d) Lesson learnt

**Unit – 4: Iran – Iraq War**

- a) Causes
- b) Highlights of the war
- c) Result and lesson learnt

**Unit – 5: Gulf of War I & II**

- a) Causes
- b) Highlights of the war
- c) Role of the UN

**REFERENCES**

- 1) Hastings, Max, The Korean War, (London: 1987)
- 2) Herring, George, America's Longest War (New York, 1996)
- 3) Fraser, T.G., The Arab - Israeli Conflict (London: 1995)
- 4) Agwani, M.S., The West Asian Crisis, New Delhi: 1995.
- 5) Colvocoressi, P., World Politics: 1954 - 2000, New Delhi : Pearson Education,2001.
- 6) Schoot, Ian., World Famous Battles , London : Magpie Books Ltd., 1994.

**ALLIED – 2**

**PAPER – 4**

**GENERAL ECONOMICS II**

**UNIT-I**

Money - Functions - Changes in supply of Money, Inflation - Deflation - Types - Characteristics - Causes - Effects - Remedies - Deflationary Gap.

**UNIT-II**

Keynesian Theory of Employment - Savings and Investment Analysis.

**UNIT-III**

Macro Economic Goals and Tools - Objectives - Central and Commercial Banking in India - Fiscal Policy - Indian Tax System.

**UNIT-IV**

Growth and Development Strategies - Planning - Agriculture and Industry under Plans with Special reference to the tenth plan.

**UNIT-V**

Budget - Salient Features - Central and State - Deficit Financing - Priorities in Budgeting - Expenditure in Defence - Recent Trends in Military Finance - Role of Social and Economic infrastructure for Defence Purposes.

**Reference Books**

**General Economics I and II**

<b>AUTHOR</b>	<b>TITLE OF THE BOOKS &amp; PUBLISHERS</b>
1. Chrystal, A, Lipsey, R.G.	: Introduction to Positive Economics, Oxford University Press
2. Garfinkel, M.R. (University of California)	: Economics of Conflict, An Overview (a paper presentation)
3. Hartley & Sandler	: Hand Book of Defence Economics, North Holland Publisher.

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4. Keith Hartley : Defence Economics and the Industrial Base (a paper presentation)  
(Centre for Defence Economics, University of York)
5. Keith Hartley : Defence Economics, Its contribution and New Developments (a paper presentation)  
(Centre for Defence Economics, University of York)
6. Lipsey, R.G., Abe Chrystal : Economics, Oxford Publication
7. Manilal B.Nanavati & Anjaria, J.J. : The Indian Rural Problem, Pub. by Indian Society of Agricultural Problem, Mumbai
8. Sankaran, S : Indian Economy, Margham Publication
9. Stonier, & Hague : Text Book of Economic Theory, Economica New Series.
10. Tarlok Singh : India's Development Experience, Macmillan

**SKILL BASED SUBJECT**

**PAPER – 2**

**NEWS AND NEWS CONTENTS**

**Objective:** This paper attempts at explaining the fundamental components of journalism – the News it also outlines the News Writing Procedures.

**Unit - I: Defining News**

- a) The ingredients of News
- b) Sources of News
- c) Reporting
- d) Editorial Policy

**Unit – II: News Content**

- a) Headlines
- b) Editorials
- c) Columns
- d) Features (Art, Entertainment, sports etc )

**Unit – III: News Writing Procedures**

- a) The paper and Headings
- b) Brief paragraphing and Readability
- c) Making up the Newspaper and aids to clarity
- d) Unusual or incorrect material

**Unit – IV**

- a) Newspaper, Radio and Writings
- b) Levels of News
- c) Hard and soft News

**Unit – V**

- a) Characteristics of Newspaper
- b) News Agencies
- c) Types of News dissemination

**REFERENCES**

- 1) Basu, R.N., News Reporting, Jaipur: Aavishkar Publishers, 2005.
- 2) Menon, P.K., Electronic Media and Broadcasting, Jaipur: Aavishkar Publishers, 2006.
- 3) Ganesh, T.K., News Reporting and Editing in Digital Age, Delhi: GNOSIS, 2006.
- 4) Cambell, Laurence Raudolph, How to Report and Write News, New Delhi: 1961.

**NON MAJOR ELECTIVE**

**PAPER – 2**

**FUNDAMENTAL OF NATIONAL SECURITY**

**Objective**

To develop a special subject knowledge on the vital concept of National Security – and the approaches to achieve National Security (Special reference to India)

**Unit – I: Introduction**

- a) Definition, Scope and features of the concept of national Security
- b) Concept of National Power – elements of national power (tangible and intangible)
- c) Fundamental factors, Values, goals and policies that determine National Security

**Unit – II: Foreign Policy and Defence Policy**

- a) Definition, Meaning, Scope of foreign policy and Defence policy.,
- b) Determinants of Foreign policy and defence policy
- c) Instruments of foreign Policy and defence policy – Diplomacy and Defence

**Unit – III: Approaches to National Security**

- a) Coercive and non Coercive approach – meaning and scope
- b) Coercive means – threats, threat perception and Defence apparatus – Armed Forces – its organization and functions (India)
- c) Non – Coercive means – peace mechanics – peace making; peace building

**Unit – IV: Strategic Environment – India:**

- a) Feature of strategic environment – its scope in policy making.
- b) India's Strategic environment – Immediate Neighbours, Adjacent Regions, Indian ocean and Global structure.
- c) India's Military preparedness – Defence Budget, Force structure and organization.

**Unit – V: India's Strategic Relationship (Salient Features):**

- a) India – Pakistan Politico – Strategic Relations.
- b) India – China Politico – Strategic Relations.
- c) India and World powers.

**REFERENCES**

- 1) Barry, Buzon., People, State and Fear : The National Security Problems in International Relations, Sussex ; Wheatsheaf Books, 1983.
- 2) Bajpai, U.S.,(ed) India's Security : The Politico-Strategic Environment, New Delhi :Lancers Books, 1983.
- 3) Dixit, J.N., Accross Borders: Fifty Years of India's Forgeign Policy, New Delhi: Picus Books, 1998.
- 4) Satish Kumar, (ed)., Yearbook on India's Foreign Policy, New Delhi : Deep & Deep,1993.
- 5) Jayaramu, P.S., India's National Security and Foreign Policy, New Delhi: ABC Publishers, 1978.
- 6) Kaul, T.N., India and the New World Order, Vol. 1, New Delhi: Gyan, 2000.
- 7) Kux, Dennis, Estranged Democracies: India and the United States 1941 - 1991, New Delhi: Sage Publications, 1994.

**SEMESTER - V**

**PAPER – 9**

**ARMED FORCES AND SOCIETY**

**Unit – 1: Study of Society**

- a) Definition forms and types
- b) Differences between Society, Community, Association and state.
- c) Special Features of military organization.

**Unit – 2: Social Groups**

- a) Definition
- b) Types
- c) Structure and importance

**Unit – 3: Leaderships**

- a) Meanings and Definition
- b) Types and levels
- c) Theories of leadership

**Unit -4: Evolution of State**

- a) Nation – Nation Building process
- b) Merits of Nation Building process
- c) Effects of Nation Building process

**Unit – 5: Civil – Military Relations**

- a) Relations in political set – up
- b) Military influence on national policy
- c) Armed forces aid to civil power.

**REFERENCES**

- 1) Sankar Rao, C.N., Sociology , New Delhi : S.Chand & Company, 1997.
- 2) Goode, W.J., Principles of Sociology, New Delhi : T M H Publishing Co. Ltd., 1977.
- 3) Koithara, Verghese., Society, State & Security : Indian Experience, New Delhi : Sage,1996.
- 4) Johnson, John., The Role of Military in Underdeveloped Countries.
- 5) Morris Janowitz , Sociology and Military Establishment.
- 6) Jewaki, Androze S., Military Organisation and Society.
- 7) Grille, Race, Class and Military.

**PAPER – 10**  
**STRATEGIC THOUGHT**

**Subject description:** This paper provides basic knowledge about the concepts of selected strategic thinkers.

**Goals:** To understand the thought of thinkers this has relevance even during the present times.

**Objective:** To make the students realize the value of strategic thought in policy formation.

**Unit I: Introduction**

- a) Concept of strategic thought
- b) Concept of Non – Violence by Gandhi
- c) Nehru and Non – Alignment

**Unit – 2: Linkages between War and Politics**

- a) Concepts of Machiavelli
- b) Concepts of Jomini
- c) Concepts of Clausewitz

**Unit – 3: Strategic Thoughts of**

- a) Vauban
- b) Schlieffen
- c) Von Moltke

**Unit – IV Concepts on land, Sea, and Air Power**

- a) Mao's theory on Guerilla warfare
- b) Mahan's theory of sea power
- c) Douhet's theory of Air power

**Unit – 5: Nuclear Strategy**

- a) The impact of Nuclear weapons on strategy
- b) Strategy of Deterrence
- c) Nuclear Strategies since 1945

**REFERENCES**

- 1) E.M.Earle (ed), *Makers of Modern Strategy: Military Thought from Machiavelli to Hitler*, 1948.
- 2) Paret, Peter (ed.), *Makers of Modern Strategy* , ( Princeton, 1986 )
- 3) Murray, Williamson, Knox, MacGregor, and Bernstein,Alvin ( eds.) , *The Making of Strategy*,(Cambridge,1994).
- 4) Weller, Jac, *Weapons and Tactics* (London, 1966).
- 5) Fuller, J.F.C., *The Foundations of the Science of War* (London, 1925).
- 6) Tripathi,K.S., *Evolution of Nuclear Strategy*, ( Delhi,1980).

**PAPER – 11**

**NUCLEAR WARFARE**

**Unit – I: Introduction**

- a) A : The evolution of nuclear era since 1945
- b) B : Basice of nuclear technology, & nuclear energy
- c) C : effects of nuclear explosion.

**Unit – II: Delivery systems**

- a) A: missiles, types & effects.
- b) B: Triad
- c) C: Tactical nuclear weapons.

**Unit – III: Nuclear Warfare Theories**

- a) A: Preventive war, pre-emptive war strategy
- b) B: massive Retaliation & Flexible Response.
- c) C: Counter Value, Counter Force, MAD & MAS.

**Unit – IV: Nuclear Weapons treaties**

- a) A: PTBT, NPT, ABM,
- b) B: SALT - I , SALT – II, START.
- c) C: CTBT.

**Unit – V: India’s Nuclear Strategy**

- a) A: Evolution of Nuclear Weapons Programme.
- b) B: Peaceful Nuclear Explosion (PNE).
- c) C: Minimum deterrence strategy.

**REFERENCES**

- 1) Cochran, Thomas, Arkin, William, and Hoenig,William, Nuclear Weapons Databook ( 5 vols., Cambridge, Mss, 1984).
- 2) Glasstone, S., and Dolan, P.J., The Effects of Nuclear Weapons ( Washington ,1977).
- 3) Grace,Charles, Nuclear Weapons: Principles, Effects and Survivability (London, 1994).
- 4) Brodie,Bernard, Strategy in the Missile Age (Princeton, 1959).
- 5) Lee, R.G., Guided Weapons (London,1988).
- 6) Pande,S., CTBT : India and the Nuclear Test Ban Treaty, New Delhi:Cosmo,1994.
- 7) Pande ,S., Future of NPT, New Delhi: Lanser,1995.
- 8) Mistry, D., Containing Strategic Missile Proliferation, Seattle: University of Washington Press,2005.

**PAPER – 12**

**DEFENCE ECONOMICS**

**Unit - I: Introduction**

- a) Definition of Economics
- b) Types of Economic System – Their Merits and Demerits
- c) Defence Vs Development

**Unit – II: Defence Budget**

- a) Concept of Finance, Revenue and Expenditure
- b) Budgetary Process, National Income , Gross National Product, Gross Domestic Product.
- c) Analysis of India’s Defence Budget during the past five years

**Unit – III: Defence Planning**

- a) Concept of Defence and Important of Defence Planning
- b) System Analysis – Its Utility in Defence Planning
- c) Cost Effectiveness and choice of Weapons System

**Unit – IV: Defence Production**

- a) Classification of Defence Requirements
- b) Role of Ordnance factories, Public and private Sector undertakings in Defence Production
- c) Role of Defence Research and Development Organization in Defence Production

**Unit – V : Effects of War on Economy**

- a) Inflation Balance of Trade and Balance of Payment
- b) Mobilization of Resources for War efforts
- c) Growth of Science and technology.

**REFERENCES**

- 1) Subramaniam,K., Defence and Development, Calcutta:Minerva,1973.
- 2) Deger,S., Military Expenditure in the Third World: The Economy Effects, London:Routledge,1986.
- 3) Kennedy, Gavin., The Military in Third World, New York:S cribners,1974.
- 4) Khanna,D.D., and P.N.Mehrotra, Defence Verses Development: Case Study of India, New Delhi:Indus Publishing Company,1993.
- 5) Subramaniam,K., Perspectives in Defence Planning, New Delhi:ABC Publishers.
- 6) Shaw and Scilevsky, Mobilizing Resources for War.

**ELECTIVE – I**

**PAPER – 1**

**A. WARFARE IN INDEPENDENT INDIA**

**Unit – I: Kashmir Operation 1947-48**

- a) Causes
- b) Outline of events
- c) Result and lessons learnt

**Unit –II: Chinese Aggression 1962**

- a) Causes
- b) Outline of events
- c) Result and Lesson learnt

**Unit – III: Indo – Pak Conflict 1965**

- a) Causes
- b) Outline of events
- c) Result and Lesson learnt

**Unit – IV: Liberation War 1971**

- a) Causes
- b) Outline of events
- c) Result and Lesson learnt

**Unit – V: Kargil Operations 1999**

- a) Causes
- b) Main Events
- c) Lessons Learnt

**REFERENCES**

- 1) Prasad,S.N., and Dharampal, History of Operations in Jammu & Kashmir, ( 1947 - 48 ), History Division, Ministry of Defence, Govt. of India, New Delhi,1987.
- 2) Sinha,S.K., Operation Rescue - Military Operations in J&K 1947-48, Delhi : Vision,1977.
- 3) Maxwell, Neville., India's China War, New Delhi: Orient Longman, 1972.
- 4) Kaul,B.N., Untold Story, Delhi : Allied,1967.
- 5) Palit, D.K., War in High Himalaya: The Indian Army in Crisis, 1962, Delhi: Lancer,1991.

- 6) Menon, V.K. Krishna, India and the Chinese Invasion, Bombay: Contemporary, 1963.
- 7) Brig. John, P. Dalvi, Himalayan Blunder, New Delhi: Nataraj, 1967.
- 8) Mankekar, D.R., 22 Fateful Days, New Delhi: Vikas, 1967.
- 9) Maj. Sitaram Johri, The Indo - Pakistan Conflict of 1965, Lucknow: Himalayas, 1967.
- 10) Moosa, M., My Version, India - Pakistan War, 1965, Lahore, 1983.
- 11) Maj.Gen. D.K.Palit, Lightening Campaign, New Delhi:Thompson Press, 1972.
- 12) Lt. Gen. J.F.R.Jacob, Surrender of Dacca, New Delhi: Manohar, 1997.
- 13) Lt.Gen. A.A.K. Niazi, Betrayal of East Pakistan, Karachi: Oxford University Press, 1990.
- 14) Brig. A.A.K. Choudary, September, 1965, Karachi: Oxford University Press, 1990.
- 15) Vice.Admiral N.Krishnan, No way but Surrender, Delhi: ABC Publishers, 1989.
- 16) The Kargil Committee Review Report, From Surprise to Reckoning, New Delhi: Sage, 2000.
- 17) Gen. V.P.Malik, Kargil : From Surprise yo Victory, New Delhi : Harper & Collins, 2006.
- 18) Gaurav, G.Sawant, Dateline Kargil, New Delhi: Vikas, 2007.

**ELECTIVE – I**

**PAPER – 1**

**B. MILITARY GEOGRAPHY**

**Unit – I: Introduction**

- a) Meaning and nature of Military Geography.
- b) Scope of Military Geography.
- c) Elements of Military Geography- Earth size, shape, location, climate, topography & population.

**Unit - II: Evolution of Military Geography.**

- a) History & Development.
- b) Founders of Military Geography - F. Ratzel, A.T. Mahan,
- c) Sir. Halfred Mackinder, Karl Haushofer, N.J. Spykman.

**Unit - III: Inter-State relations & Geographical factors.**

- a) Frontiers and Boundaries- meaning & differences; types; boundary making & function.
- b) Communication routes- land, sea and aerial- strategic scope.
- c) Population and Power.

**Unit - IV: Geography and Foreign Policy of India.**

- a) India's Geo-strategic significance-location, size, shape, climate, topography, resources etc.
- b) India's borders- nature and characteristics of land border; maritime boundary.
- c) Indian Ocean territory and strategic significance.

**Unit - V: Applied Military Geography.**

- a) Global Positioning System (GPS).
- b) Global Information System (GIS).
- c) Remote Sensing.

**REFERENCES**

- 1) Das, S.T., Geo-Strategies, Allahabad:Kitab Mahal,1985.
- 2) Black, Jeremy, Cambridge Illustrated Atlas, Warfare, Renaissance to Revolution: 1492-1792, (Cambridge: Cambridge University Press,1996).
- 3) Chandler, David G., Atlas of Military Strategy : The Art, Theory and Practice of War, 1618-1878, (1980 reprint, London: Arms and Armour,1996)
- 4) William D Puleston, The Life and Work of Alfred Thayer Mahan, U.N.S. (New Haven, CT,1939) 5) Earl Meade, Edward, Makers of Modern Strategy: Military Thought from Maciavelli to Hitler,1948.

**ELECTIVE – I**

**PAPER – 1**

**C. ESSENTIALS OF PUBLIC ADMINISTRATION**

This paper introduces the discipline of Public Administration; its methods & scope. It introduces the structure and functions of the Union and State Administration; the organization principles and the Public Management through administrative services.

**Unit – I: Introduction**

- (a) Meaning, nature, scope and importance of Public Administration.
- (b) Evolution of Public Administration.
- (c) Public Administration and other Social Sciences.
- (d) Arts and Science of Public Administration.

**Unit - II: Union Administration.**

- (a) President.
- (b) Prime Minister's office.
- (c) Central Secretariat.
- (d) Organisation of Ministers.

**Unit – III: State Administration**

- (a) Governor.
- (b) Chief Minister's office.
- (c) State Secretariat.
- (d) Organisation of Ministers.

**Unit - IV: Organisation - Principles.**

- (a) Hierarchy & Span of Control.
- (b) Unity of Command,
- (c) Centralisation & De-centralisation.
- (d) Coordination.

**Unit – V: Public Management.**

- (a) Principles of Management- motivation; communication; decision-making; leadership.,
- (b) All India Services - IAS., IPS., IFS., & other central services.
- (c) State Administration- Collectors., Superintendent of Police., Tahsildars & BDO,s.
- (d) Centre - State relations.

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- 3) Arora and Rajni Goyal, Indian Public Administration, New Delhi:Wishwa Prakashan,2006.
- 4) Avasthi & S.R.Maheshwari, Principles of Public Administration, New Delhi:Lakshmi Narain Agarwal,1990.
- 5) Tyagi, A.R., Principles of Public Administration, New Delhi:Atma Ram,1990.

**SKILL BASED SUBJECT**

**PAPER – 3**

**NEWS WRITING PROCEDURE AND NEWS STORY**

**Objective:** This paper aims at teaching the students the nuances in presenting a News story. The usage of words in writing a story to make an impact on the reader is taught to the students in this paper.

**Unit – I: Introduction to News Writing Procedure**

- a) Where to begin, the Date and Place
- b) Paragraphing and Readability
- c) Aids to clarity and Journalistic Style

**Unit – II: Defining the News Story**

- a) The Journalist as an Interpreter
- b) The inverted Pyramid News vs Sequential Style
- c) The Usage of the third person, Grammar Quotation and Ending the story

**Unit – III: The Five ‘W’s**

- a) Emphasizing important points
- b) The Importance of time
- c) Telling a story ‘Where’ and other application of the ‘W’ s

**Unit – IV: Types of News story**

- a) Political
- b) Industrial and Finance
- c) Civic Affairs

**Unit – V: Specialized Reporting**

- a) Science Reporting
- b) Industrial Reporting
- c) Entertainment Reporting

**REFERENCES**

- 1) Menon, P.K, Electronic Media and Broadcasting, Jaipur : Aavishkar Publishing, 2006.
- 2) Sharma, R.K., Journalism as a Profession in India, Mumbai:Media Promoters and Publishers,1990.
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**SEMESTER - VI**

**PAPER – 13**

**NATIONAL SECURITY OF INDIA**

**Unit – I: Concept of Security**

- a) Meaning, definition and Objectives
- b) Elements of National Security
- c) Kinds of National Security

**Unit - II: Threats to National Security**

- a) Meaning and Definition
- b) Threat Perception
- c) Types of threats and threats to India

**Unit - III: India's Strategic Relations with its Neighbors**

- a) Pakistan
- b) China
- c) Other SAARC members

**Unit – IV: India's Strategic Relations with**

- a) USA
- b) Russia

**Unit – VI: India's Interest in Asia**

- a) India and West Asia
- b) India and Asean
- c) India and Indian Ocean.

**REFERENCES**

- 1) Barry, Buzon., People, State and Fear : The National Security Problems in International Relations, Sussex ; Wheatsheaf Books, 1983.
- 2) Bajpai, U.S.,(ed) India's Security : The Politico-Strategic Environment, New Delhi :Lancers Books, 1983.
- 3) Dixit, J.N., Accross Borders : Fifty Years of India's Forgeign Policy, New Delhi : Picus Books, 1998.
- 4) Satish Kumar, (ed) ., Yearbook on India's Foreign Policy, New Delhi : Deep & Deep,1993.
- 5) Jayaramu, P.S., India's National Security and Foreign Policy ,New Delhi: ABC Publishers, 1978.
- 6) Kaul, T.N., India and the New World Order, Vol. 1, New Delhi : Gyan, 2000.
- 7) Kux, Dennis, Estranged Democracies: India and the United States 1941 - 1991, New Delhi: Sage Publications, 1994.

**PAPER – 14**

**INTERNATIONAL LAW**

**Unit – I: Introduction**

- a) Definition of International Law – Its history and development
- b) Nature, source and codification
- c) Relationship between International Law and Municipal Law

**Unit – II: Laws of war – I**

- a) Forcible means of settlement of international disputes
- b) War – Its legal character and effects
- c) Termination of war and post liminium

**Unit – III: Laws of war – II**

- a) Laws of Land warfare
- b) Laws of Maritime warfare
- c) Laws of Aerial Warfare

**Unit – IV: Laws of Neutrality**

- a) Basic understanding of laws of neutrality
- b) Right of Angry
- c) Contraband and Doctrine of Continuous Voyage

**Unit – V: Legal Mechanisms**

- a) Blockade – Concept establishments Kinds and Penalties for breach
- b) Prize courts Its role and importance
- c) Role and functions of International court of Justice.

**REFERENCES**

- 1) Tandon, M.P, and Rajesh Tandon, An Introduction of International Law, Allahabad: Allahabad Law Agency, 1987.
- 2) Kapoor, S.K., International Law, Allahabad; Allahabad Law Agency,1989.
- 3) Chavan, R.S., An Approach to International Law, New Delhi: Sterling, 1971.
- 4) Starke, J., An Introduction to International Law.
- 5) Oppenheim, International Law.

**PAPER – 15**

**ARMS CONTROL AND DISARMAMENT**

**Objectives:** Arms Control Efforts from the formation of nation, State system is attempted in this paper. Efforts towards disarmament gained momentum after the Second World War which is portrayed in this paper.

**Unit - I: Introduction**

- a. Definition of Arms Control, Arms Limitations, Arms Reduction and Arms Trade.
- b. Differences between Arms Control, Arms Limitations, Arms Reduction and Arms Trade.
- c. Nature and Scope of Arms Control and Disarmament.

**Unit – II: From Treaty of Westphalia to World War – II**

- a. Efforts towards Disarmament from Treaty of Westphalia 1648 to the Outbreak of World War I
- b. Efforts towards Disarmament from World War I to the outbreak of World War II.
- c. Efforts towards the formation of the UNO.

**Unit – III: UN and Disarmament**

- a. UN's Perception on Disarmament and Arms Control.
- b. Major efforts till the Disarmament Decade.
- c. Causes and failures.

**Unit – IV: Disarmament Efforts – Success Story**

- a. PTBT, NNPT
- b. SALT I and II
- c. INF, START and Outer space.

**Unit –V: Disarmament Efforts by Other Bodies**

- a. NAM
- b. Nuclear Free Zones
- c. Efforts of India

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- 1) Subramaniam, K., Nuclear Proliferation and International Security, New Delhi: Lancer,1986.
- 2) Pande, S., Future of NPT, New Delhi: Lancer,1995.

- 3) Pande, S., CTBT: India and the Nuclear Test Ban Treaty, New Delhi: Cosmo, 1994,
- 4) Mistry, D., Containing Strategic Missile Proliferation, Seattle: University of Washington Press, 2005.
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- 6) Bhattachatyya, D.C., International Relations Since the Twentieth Century, Kolkata: Vijoya Publishing House, 2001.

**ELECTIVE – II**

**PAPER – 2**

**A. SPECIALIZED WARFARE**

**Subject Description:** This paper describes the various types of warfare that are taught in the world.

**Goals:** To understand the different types of war waged by nations at large.

**Objective:** After completing the paper the students will understand the types of war prevalent in the world

**Unit – I: Psychological Warfare**

- a) Definition and nature of psychological Warfare
- b) Types of Propaganda
- c) Brain washing and its effect
- d) Rumor : Nature and techniques

**Unit – II: Biological and Chemical Warfare**

- a) Concept and objectives
- b) Characteristics
- c) Types of agents and Methods of Use
- d) Recent Trends

**Unit – III: Guerilla Warfare**

- a) Concept and objectives
- b) Characteristics Guerilla Warfare
- c) Elementary knowledge of Insurgency and Counter Insurgency

**Unit – IV: Nuclear warfare**

- a) Concept and origin of Nuclear Warfare
- b) Effects of Nuclear flash, Thermal Radiation, Nuclear Radiation
- c) Elementary knowledge of Missiles

**Unit – V : Terrorism**

- a) Definition
- b) Causes
- c) Types of Techniques

**REFERENCES**

- 1) Philip M. Taylor, *Munitions of the Mind: War Propaganda from the Ancient World to the Nuclear Age*, (Wellingborough, 1990)
- 2) Qualter, T.H., *Propaganda and Psychological Warfare*, (New York, 1962)
- 3) SIPRI, *The Problem of Chemical and Biological Warfare* (4 Vols, New York, 1971)
- 4) Brown, F.J., *Chemical Warfare : a Study in Restraint*, ( Princeton,1968)
- 5) Walter Laqueur, *Guerilla*, ( London,1977)
- 6) Fairbairn, G., *Revolutionary Guerilla Warfare* (Harmondsworth,1974)
- 7) Asprey, R.B., *War in the Shadows* (London,1975)
- 8) Lawrence Freeman, *The Evolution of Nuclear Strategy* (London,1981)
- 9) Herbert Feis, *The Atomic Bomb and the End of World War II* (Princeton, 1966)

**ELECTIVE – II**

**PAPER – 2**

**B. WARFARE AND TECHNOLOGY**

**Unit – I: Introduction**

- (a) Historical evolution of warfare.
- (b) Evolution of Science & Technology.
- (c) Synergy of warfare and science & technology.

**Unit – II: Science & technology and its Scope.**

- (a) S&T - applications- Military, Non-military, and Dual usage.
- (b) Industrial revolution & new technologies- IC- Engine, Radio, Electricity, & Radar.
- (c) Emerging Technologies- Nuclear science, Oceanography, Space technology & electronics.

**Unit – III: Weapons Technology & Warfare**

- (a) Weapons of Land Warfare- types of arms and armaments & artillery.
- (b) Naval Weapons- types of ships, aircraft carrier, submarines, torpedo.
- (c) Aerial War Weapons- types of aircrafts, missiles, satellites, radars.

**Unit – IV: Emerging Technologies & Warfare**

- (a) Information Technology and communication warfare.
- (b) Robotics and Cyber war.
- (c) R M A - revolution in military affairs.

**Unit – V: Weapons Technology and India.**

- (a) Pioneering institutions and its contributions.
- (b) S & T policy of India.
- (c) D R D O - its role in weapons development.

**REFERENCES**

- 1) Ajey Lele, Strategic Technology for the Military, New Delhi: Sage, 2009.
- 2) Gopalakrishnan, K.V., Impact of Science and Technology on Warfare, New Delhi: National Book Trust, 2003.
- 3) Buzon, Barry., An Introduction to Strategic Studies: Military Technology and International Relations, New York: St. Martin Press, 1987.
- 4) Kelen, John., Space Warfare: Strategy, Principles and Policy' London: Routledge, 2006.
- 5) Nair, K.K., Space the Frontier of Modern Defence, New Delhi: Knowledge World, 2006.
- 6) Pruthi, R.K.(ed)., Robotic Warfare, Delhi: Prashant Publishing House, 2009.
- 7) Rappert, Brain (ed)., Technology and Security: Governing Threats in the New Millennium, New York: Hamshire, Palgrave Macmillan, 2007.

**ELECTIVE – II**

**PAPER – 2**

**C. ELEMENTARY STUDY OF THE CONSTITUTION OF INDIA**

This paper introduces the Indian Constitution and its salient features - fundamental rights and directive principles of state policy. The role and functioning of the executive, legislature and the judiciary.

**Unit – I: Introduction**

- (a) Meaning and scope of Constitution.
- (b) Types of constitution-written & unwritten; flexible & rigid; unitary & federal.
- (c) Salient features of Indian constitution,
- (d) Fundamental Rights & Directive principles of state policy.

**Unit – II: The Union Executive**

- (a) The President of India-Qualifications, election procedure.
- (b) The role of the President.
- (c) The Vice-President of India-Qualification & election procedure.
- (d) The role of the Prime Minister.

**Unit- III: The Parliament of India**

- (a) Lok Sabha- its composition and function.
- (b) Rajya Sabha- its composition and function.
- (c) Basic legislative procedures.
- (d) Budget-procedure & scope.

**Unit – IV: The State Administration**

- (a) The Governor- role and powers of Governor.
- (b) The role and function of the Chief Minister.
- (c) The State legislature - its role & functions.

**Unit – V: The Constitutional Bodies in India**

- (a) The role and function of the Supreme Court of India.
- (b) The role and function of the Election Commission.
- (c) The role and function of the Comptroller and Auditor General (CAG).
- (d) The role and function of Union Public Service Commission (UPSC).

**REFERENCES**

- 1) Basu, D.D., Introduction to the Constitution of India, 20th edn. Nagpur: LexisNexis, 2008.
- 2) Basu, D.D., Shorter Constitution of India, 14th edn., Nagpur: LexisNexis, 2008.
- 3) Arvind P Datar, Constitution of India, 3 Vols, Nagpur: LexisNexis, 2007.

**ELECTIVE – III**

**PAPER – 3**

**A. DEFENCE MANAGEMENT**

**Unit – I**

Definition, Scope and Principles of Management and Decision Making Process and HDO of India.

**Unit – II**

Defence organization – nature and structure [Line and staff, Pyramid hierarchy in Army Navy and Air Force].

**Unit – III**

Personnel Management – Staffing [Recruitment and Training]

**Unit – IV**

System Analysis – Qualitative Management and Evaluation of Defence Forces

**Unit – V**

Cost Effectiveness – Force Level, Production and procurements of weapons systems and R and D

**REFERENCES**

- 1) Knoontz and O'Donnel, Principles of Management, (Printice,1976)
- 2) Osgood, Robert, Principles of Management, New Delhi: Printice-Hall,1978.
- 3) Davar,R.S., Management, Delhi:Cosmos,1975.
- 4) Keatz, James Euerett., Arms Production in the Developing Countries, London:Lexington Books,1984.

**ELECTIVE – III**

**PAPER – 3**

**B. HUMAN RIGHTS**

**Unit – I: Definition and evolution of the concept.**

- (a) Meaning, Nature and Development.
- (b) Three Generation Rights.
- (c) Contributions: Hobbes, Locke, Rousseau and Rawls.

**Unit – II: Approaches & Perspectives.**

- (a) Universalistic and Relativist approaches.
- (b) Feminist & Marxist approach.
- (c) Third World Perspective- Gandhian view.

**Unit – III: United Nations & Human Rights.**

- (a) U N Charter and the Universal Declaration of Human Rights.
- (b) International Conventions and Covenants.
- (c) Other Protocols.

**Unit – IV: Indian Perspective**

- (a) Human Rights in Indian tradition- Civil, Political, Economic, Cultural Rights & Womens Rights.
- (b) Constitutional & Legal framework in India- Human Rights Commission & Special Commission for weaker section.
- (c) Human Rights Education: UNESCO & Montreal Protocol.

**Unit – V: Issues and Challenges**

- (a) Human Rights and challenges - ethnic conflict, social & political violence, global terrorism, environmental sources.
- (b) Rights of Refugees.
- (c) Internally Displaced people.

**REFERENCES**

- 1) Bajwa, G.S., Human Rights in India : Implementations and Violations, New Delhi: Sterling, 1995.
- 2) Mehta, P.L., Verma, N., Human Rights Under the Indian Constitution, New Delhi : Deep & Deep, 1999.

**B.A. Defence and Strategic Studies: Syllabus (CBCS)**

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- 5) Sehgal, B.P.S., Human Rights in India : Problems and Prospects, New Delhi : Deep & Deep' 2004.
- 6) Deshta, S., Deshta, K., Fundamental Human Rights, New Delhi : Deep & Deep, 2003.

**ELECTIVE – III**

**PAPER – 3**

**C. FERRORISM**

This paper introduces the concept of Terrorism and its manifestations in historical perspective. Motivated organised violence targeting the population and the government threatening the existing social and political order has become very prevalent in today's world. Basic understanding of terrorism is essential to appreciate the events in right perspective.

**Unit – I: Introduction**

- (a) Definition and meaning of Terrorism.
- (b) History of Terrorism.
- (c) Nature and Tactics of Terrorism.

**Unit – II: Terrorism in perspective**

- (a) Causes of Terrorism.
- (b) Types of Terrorism.
- (c) Levels of Terrorism.

**Unit – III: Terrorism and India**

- (a) Kashmir- Cross-border terrorism - Lashkar-e-Toiba;Talibans,
- (b) Extremism in North-East India.
- (c) Naxalites in India.
- (d) Parliament & Mumbai Taj hotel attack.

**Unit - IV: International Terrorism**

- (a) Palestinian Issue.
- (b) Irish Issue.
- (c) Sri Lanka- LTTE Issue.
- (d) September 11 attack in the USA.-Al Qaeda.

**Unit – V: Terrorism in International Relations**

- (a) War against Terrorism- responses of Major Powers.
- (b) Terrorism and United Nations Organisation.
- (c) Terrorism and other International Organisations.

**REFERENCES**

- 1) Yonah Alexander, David Carton and Paul Wilkinson, *Terrorism : Theory and Practice*, Colorado: West View Press,1979.
- 2) Walter Laqueur, *Terrorism*, Boston: Little Brown and Co., 1977.
- 3) B.P.Singh, Sehgal, *Global Terrorism: Socio-Political and Legal Dimensions*, New Delhi: Deep & Deep Publications,1996.
- 4) Virender Grover, (ed)., *Encycloepadia of International Terrorism: Terrorism, History and Development*, Vol.1, New Delhi; Deep & Deep Publications,2002.
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**SEMESTER – VI**

**SKILL BASED SUBJECT**

**PAPER – 4**

**BASICS OF DEFENCE JOURNALISM**

**Objective :** To Prepare the students in handling a specialized field of journalism Viz defence journalism

**UNIT-II: Introduction**

- a) Defence Journalism – its features
- b) Civil Journalism & Defence journalism differences
- c) Defence Writing – Need for specialist
- d) Defence Journalism – As a Profession

**UNIT-II : Defence News**

- a) Meaning and Defining Defence News
- b) Kinds of Sources of defence News
- c) Defence Writing Procedure

**UNIT-III : Defence Reporting**

- a) Format languages and grammar
- b) Forms – Eye witness, computer assigned features
- c) Concept of Graphics and Animation (Role of Modern Technology)

**UNIT-IV : Defence Terminology**

- a) Defence terms & Abbreviations
- b) Military terms – Weapons, Weapons system
- c) Defence organization – Rank and Rank structure in the services in India

**UNIT-V: Problem in Defence writing**

- a) Media Ethics
- b) Media Laws
- c) Problem in Defence Writing – Political Pressure Official Secrecy – etc.,
- d) Introducing existing defence Journals Sainik, Samachar, Trishul, Strategic Digest ,Strategic Analysis etc.

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- 1) Waren ,K Agrie., (ed)., The Press and the Public Interest, Washington, D.C.: Public Affairs Press, 1968.
- 2) Bhatt, S.C., Practical Journalism, Jaipur: Aavishkar, 2005.
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