CERTIFICATE COURSE IN NURSERY AND GARDENING 2018-19

DEPARTMENT OF BOTANY







Government College for Women(A), Guntur

Department of BOTANY

CERTIFICATE COURSE ON NURSERY AND GARDENING 2018-2019

MANUAL ON NURSERY AND
GARDENING









Syllabus for Certificate Course on Nursery & Gardening

Total hours of teaching & practical - 30 hrs @ 3 hrs per week

Unit 1: Nursery

- 1. Definition, objectives, and scope
- 2. Planting direct seeding and transplants.

Unit 2: Seed

structure and types:

- 1. Seed dormancy, causes, and methods of Breaking dormancy.
- 2. Seed storage, seed banks, factors affecting seed viability, and genetic erosion.
- 3. Seed production technology- seed testing and certification.

Unit 3: Vegetative propagation

- 1. Air layering, cutting, selection of cuttings, collecting season, treatment of cutting, rooting medium, planting of cutting-hardening of plants.
- 2. Green houses-mist chambers, shed root, shade houses, and glass houses.

Unit 4: Gardening

- 1. Definition, objectives, and scope-different types of gardening.
- 2. Landscape and home gardening packs and its components, Plant materials, and design
- 3. Computer application in landscaping
- 4. Gardening operation: soli layering, manuring, watering
- 5. Management of pests and diseases and harvesting.

Unit 5: Sowing/raising of seeds and seedlings

- 1. sowing/raising of seeds and seedlings, transplanting of seedlings
- 2. study of cultivation of different vegetables: cabbage, brinjal, lady's finger, onion, garlic, tomatoes, and carrots- storage and marketing procedures.

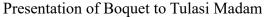
- 1. Increase propagation of specific plant species.
- 2. Understand seed structure, storage, and certification techniques.
- 3. Master various vegetative propagation methods: cutting, grafting, and layering.
- 4. Enhance abilities in pesticide-free vegetable cultivation.
- 5. Establish kitchen garden clubs for doorstep advisory services.
- 6. Attain agricultural self-reliance for food security and crop yield improvement.

Inauguration of certificate course

The Department of Botany launched a certificate course on "Nursery and Gardening" aimed at third and second-year students, drawing participation from 75 individuals across various disciplines. The inaugural session on September 6, 2018, was led by the Acting Principal, Dr. Ch. Tulasi Masthanamma, who underscored the significance of nursery development and gardening. Smt. D. Uma Nischal delineated the syllabus, while Dr. Ch. Bhaskar, the Head of the Department, emphasized the course's relevance in combating global warming and pollution. Following discussions, both faculty members and students engaged in a plantation program, highlighting the practical aspect of the course. This initiative is poised to equip students with valuable skills for nurturing home gardens and promoting sustainability in agriculture.

Inauguration Certificate Course on Nursery and Garden Development







I/C principal speech



HoD Dr.Ch.Bhaskara Rao addressing the students'



Brief description of the certificate course by Smt D.Uma

Outcomes of Certificate Course

- 1. **Knowledge Acquisition**: Gain a solid understanding of fundamental principles in plant biology, soil science, pest management, and plant propagation techniques.
- 2. **Practical Skills Development**: Acquire hands-on experience in nursery management, plant propagation methods, landscaping techniques, and garden design principles through practical sessions and fieldwork.
- 3. **Professional Competence**: Develop the skills necessary to work in various roles within the horticulture industry, including nursery management, landscaping, garden maintenance, and plant retail.
- 4. **Certification**: Obtain a certificate in nursery gardening upon successful completion of the course, which may enhance credibility and employability in the field.
- 5. Career Opportunities: Access entry-level positions in nurseries, garden centers, landscaping companies, parks and recreation departments, botanical gardens, and agricultural extension services.
- 6. **Further Education**: Lay the foundation for further education and career advancement, such as pursuing a bachelor's degree in horticulture, landscape architecture, or related fields.
- 7. **Entrepreneurship**: Gain the knowledge and skills needed to start and manage a small nursery business or landscaping enterprise.

8. **Community Engagement**: Contribute to community beautification efforts, urban greening initiatives, and environmental conservation projects through the application of nursery gardening knowledge and skills.

Overall, the outcomes of a nursery gardening certificate course empower degree students with a strong foundation in horticulture and practical skills essential for success in various professional endeavors within the green industry.

EXHIBITION ON NURSERY AND GARDENING

The Department of Botany hosted an Exhibition on Nursery and Gardening on 5th January 2019 with the following objectives:

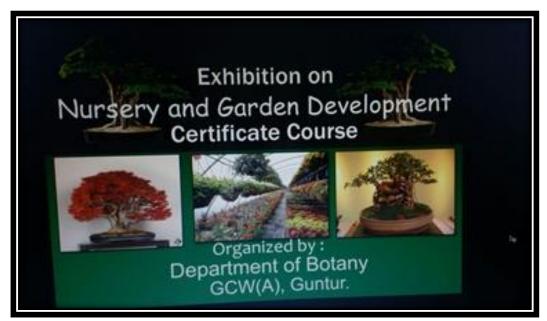
- 1. Educating about Nursery and Garden development.
- 2. Raising awareness about Nursery and Gardening practices.
- 3. Promoting environmental consciousness to uphold biodiversity.
- 4. Showcasing various aspects of Nursery and Gardening.

The event, inaugurated by Dr. Ch. Pulla Reddy and Dr. Ch. Tulasi, featured displays from nearly 50 students. Exhibits included Glass Terrariums, Floral Arrangements, Vegetable Carving, Floral Staking, and techniques like Vegetative Propagation through cuttings, grafting, and layering. Greenhouse technology, Bonsai cultivation, and eco-friendly coconut pots were also highlighted.

After the successful exhibition, a valedictory function was held, attended by faculty members and distinguished guests. Md. Karishma Khanam & Pavithra received top honors, while special recognition was given to Md. Haniya Sultana and Ch. Jyothi for their efforts in artificial flower preparation and carving. Faculty members contributed significantly to the event's success.

In summary, the exhibition aimed to educate, inspire, and promote sustainable gardening practices among students and attendees, fostering a deeper appreciation for horticulture and environmental stewardship.

.



Students Exhibiting the Exhibits



Floral Art by Students



Vegetative propagation methods



Artificial floral arrangements



Eco friendly coconuts





Vegetable carving Bonsai





Vegetable carving



Botany HOD Dr.Ch.Bhaskara Rao Addressing the gathering



Principal Dr.Ch.Pulla Reddy Sir Speech



UGC Coordinator Dr.Ch.Tulasi madam



Brief report on Exhibition presented by Convener D.Uma Nischal



Students Feed back





Students observing the Exhibits from different colleges



Flower exhibit



Botany Dept Faculty members



Momento Presentation by Principal Dr.Ch.Pulla Reddy



Medal Presentation by Dr. Tulasi madam



Medal Presentation by Smt. D.Uma Nischal



Medal Presentation by Smt.K.Sudha Rani



Certificate Presentation by HOD, Dr.Ch.Bhaskara rao



Certificate Presentation by Smt.D.Uma Nischal



Certificate Presentation by Smt.K.Sudha Rani



Certificate Presentation by Dr. Tulasi Madam



Students participated in the exhibition

Nursery & Gardening certificate course students enrolment list 2018-19

S. No	Name of the Student	Group
1	A. Vasantha Lakshmi	II B. Sc (BT. BC. C)
2	K. Sarojini	II B. Sc (BT. BC. C)
3	S. Annapurna	II B. Sc (BT. BC)
4	P. Sravani	II B. Sc (BT. BC)
5	Alekhya	I B. Com (Computers)
6	G. Parvithra	II B.A (F.E)
7	Ch. Hymavathi	II B.A (HEP)
8	K. Bala swapna	III B. Sc (BZC)
9	R. Sri veni	II B.A (FE)
10	D. Ramya	II B.A (CE)
11	B. Mounika	II B.A (HEP)
12	K. Priyanka	II B.A (HEP)
13	P. Sowjanya	II B.A (HEP)
14	D. Rathna kumari	II B.A (HEP)
15	Sk. Fiza	II B.A (CE)
16	Y. Anantha lakshmi	III B. Com (General)
17	R. Sai mahitha	II B.A (CE)
18	D. Divya	II B.A (CE)
19	K. Anjali	II B.A (CE)
20	K. Shanmukha valli	II B.A (FE)
21	P. Karishma khanam	II B.A (FE)
22	Ch. Aswani	II B. Sc (MS.CS)
23	P. Sravani	II BSc (MS.CS)
24	K. Sandya Rani	III B. Sc (BZC)
25	D. Sri lakshmi	III B. Sc (BZC)
26	B. Lakshmi Bai	II B.A (HEP)
27	B. Swapna	II B.A (HEP)
28	M. Priyanka	III B. Sc (BZC)
29	V. Shubashini	II B.A (HEP)
30	D. Usharani	III B. Sc (B3)
31	D. Sai Gowthami	III B. Sc (C1)
32	S. Supriya	III B. Sc (B3)
33	Y. Deepthi	III B. Sc (B3)

34	E. Yamuna	III B. Sc (B3)
35	P. Naga Lakshmi	III B. Sc (B3)
36	K. Neelima	III B. Sc (B3)
37	V. Sowjanya	II B. Sc (B3)
38	G. Kamala	III B. Sc (C1)
39	P. Ramya	III B. Sc (C1)
40	B. Maheswari	III B. Sc (C1)
41	G. Varshitha	III B. Sc (C1)
42	Sk. Sumrana Tabassum	III B. Sc (C1)
43	Dasari. Nirusha	III B. Sc (C1)
44	S. Manasa	III B. Sc (C1)
45	P. Hemalatha	III B. Sc (C1)
46	S. Anusha	III B. Sc (C1)
47	Md. Khaja Shahanaz	III B. Sc (C1)
48	D. Sai Gowthami	III B. Sc (C1)
49	Shaik. Bajidbi	III B. Sc (C1)
50	G. Amulya Harshitha	III B. Sc (C1)
51	T. Harika	II BA(SHT)
52	Sd. Haniya Sultana	III B. Sc
53	G. Naga Lakshmi	II B. A
54	V. Sailu	III B. Sc (B1)
55	P. Sandhya	II BA (HEP)
56	Dhana Lakshmi	II BA (HEP)
57	D. Ratna kumara	II BA (HEP)
58	P. Roja	III B. Sc (B3)
59	D. Gayathri lakshmi prasanna	III B. Sc (B1)
60	V. Nagamani	III B. Sc (B3)
61	K. Puja	III B. Sc (C2)
62	B. Anjalu bai	III B. Sc (B1)
63	J. Sirisha	III B. Sc (B1)
64	N. Sharmila	III B. Sc (B1)
65	M. Saji bai	III B. Sc (B1)
66	B. Lakshmi Tirupathamma	III B. Sc (C2)
67	K. Anitha	III B. Sc (C2)
	K. Anitha G. Aruna	III B. Sc (C2)

70	T. Roshini	III B. Sc (B1)
71	K. Lakshmi Tarangini	III B. Sc (B1)
72	M. Lakshmi Durga	III B. Sc (B1)
73	Ch. Siva Priya	III B. Sc (B1)
74	D. Anupama	II B. Com (comp)
75	J. Ravi Pranitha	II BA (CE)

Course completion certificate



Marks Award list

S. No	Name of the Student	Group	Hall ticket No	Marks
1	A. Vasantha Lakshmi	II B. Sc (BT. BC. C)	17407002	411/2
2	K. Sarojini	II B. Sc (BT. BC. C)	17407001	40
3	S. Annapurna	II B. Sc (BT. BC)	17406008	44
4	P. Sravani	II B. Sc (BT. BC)	17406002	44
5	Alekhya	I B. Com (Computers)	18202027	40
6	G. Parvithra	II B.A (F.E)	17106003	50
7	Ch. Hymavathi	II B.A (HEP)	17101008	50
8	K. Bala swapna	III B. Sc (BZC)	16401020	43
9	R. Sri veni	II B.A (FE)	17106007	50
10	D. Ramya	II B.A (CE)	17103004	50
11	B. Mounika	II B.A (HEP)	17101001	50
12	K. Priyanka	II B.A (HEP)	17101020	44
13	P. Sowjanya	II B.A (HEP)	17101029	42
14	D. Rathna kumari	II B.A (HEP)	17101012	47
15	Sk. Fiza	II B.A (CE)	17103019	45
16	Y. Anantha lakshmi	III B. Com (General)	16201065	40
17	R. Sai mahitha	II B.A (CE)	17103018	42
18	D. Divya	II B.A (CE)	17103003	50
19	K. Anjali	II B.A (CE)	17103010	50
20	K. Shanmukha valli	II B.A (FE)	17106005	50
21	P. Karishma khanam	II B.A (FE)	17106006	50
22	Ch. Aswani	II B. Sc (MS.CS)	17303006	50
23	P. Sravani	II BSc (MS.CS)	17303043	43
24	K. Sandya Rani	III B. Sc (BZC)	16401024	48
25	D. Sri lakshmi	III B. Sc (BZC)	16401030	43
26	B. Lakshmi Bai	II B.A (HEP)	17101003	43
27	B. Swapna	II B.A (HEP)	17101002	47
28	M. Priyanka	III B. Sc (BZC)	16401003	50
29	V. Shubashini	II B.A (HEP)	17101042	40
30	D. Usharani	III B. Sc (B3)	16404018	50
31	D. Sai Gowthami	III B. Sc (C1)	16409025	45
32	S. Supriya	III B. Sc (B3)	16404004	28
33	Y. Deepthi	III B. Sc (B3)	16404009	40
34	E. Yamuna	III B. Sc (B3)	16404006	44

35	P. Naga Lakshmi	III B. Sc (B3)	16404011	50
36	K. Neelima	III B. Sc (B3)	16404015	50
37	V. Sowjanya	II B. Sc (B3)	16404014	50
38	G. Kamala	III B. Sc (C1)	16409002	40
39	P. Ramya	III B. Sc (C1)	16409011	44
40	B. Maheswari	III B. Sc (C1)	16409005	41
41	G. Varshitha	III B. Sc (C1)	16409026	37
42	Sk. Sumrana Tabassum	III B. Sc (C1)	16409029	45
43	Dasari. Nirusha	III B. Sc (C1)	16409017	48
44	S. Manasa	III B. Sc (C1)	16409022	50
45	P. Hemalatha	III B. Sc (C1)	16409009	47
46	S. Anusha	III B. Sc (C1)	16409018	50
47	Md. Khaja Shahanaz	III B. Sc (C1)	16409028	50
48	D. Sai Gowthami	III B. Sc (C1)	16409025	40
49	Shaik. Bajidbi	III B. Sc (C1)	16409004	50
50	G. Amulya Harshitha	III B. Sc (C1)	16409019	50
51	T. Harika	II BA(SHT)	17102014	42
52	Sd. Haniya Sultana	III B. Sc	10409014	40
53	G. Naga Lakshmi	II B. A	17104007	42
54	V. Sailu	III B. Sc (B1)	16402018	24
55	P. Sandhya	II BA (HEP)	17101034	45
56	Dhana Lakshmi	II BA (HEP)	17101021	45
57	D. Ratna kumara	II BA (HEP)	17101012	47
58	P. Roja	III B. Sc (B3)	363	24
59	D. Gayathri lakshmi prasanna	III B. Sc (B1)	(275)16402009	24
60	V. Nagamani	III B. Sc (B3)	16402004	26
61	K. Puja	III B. Sc (C2)	16401023	45
62	B. Anjalu bai	III B. Sc (B1)	16402010	38
63	J. Sirisha	III B. Sc (B1)	16402021	38
64	N. Sharmila	III B. Sc (B1)	16402012	38
65	M. Saji bai	III B. Sc (B1)	16402017	40
66	B. Lakshmi Tirupathamma	III B. Sc (C2)	16401031	40
67	K. Anitha	III B. Sc (C2)	16401002	40
68	G. Aruna	III BZC (TM)	16401005	42
69	D. Divya	II BA (CE)	17103003	50
70	T. Roshini	III B. Sc (B1)	16402008	28

71	K. Lakshmi Tarangini	III B. Sc (B1)	16402028	24
72	M. Lakshmi Durga	III B. Sc (B1)	16402022	24
73	Ch. Siva Priya	III B. Sc (B1)	16402020	28
74	D. Anupama	II B. Com (comp)	17202007	28
75	J. Ravi Pranitha	II BA (CE)	17103006	37

Nursery and Garden Development

Certificate Course Examination

2018-19

Duration: 1 ½ hrs Max. Marks: 50

Time: 1.30 to 3 pm

I. Write any 15 of the following. Each question carries two marks.

15x2 = 30M

- 1. What is a Nursery?
- 2. What is seed Dormancy
- 3. Stratification.
- 4. Difference between orthodox and Recalcitrant seeds
- 5. MSBP
- 6. Seed certification
- 7. Air Layering
- 8. Plant cuttings.
- 9. Green House
- 10. Shade Home
- 11. Objectives of Gardening.
- 12. Park
- 13. Manuring
- 14. Different Methods of watering.
- 15. Sowing
- 16. Sowing types
- 17. Transplanting.
- 18. CSA
- 19. Harvesting.
- 20. Common possible errors during Plantation

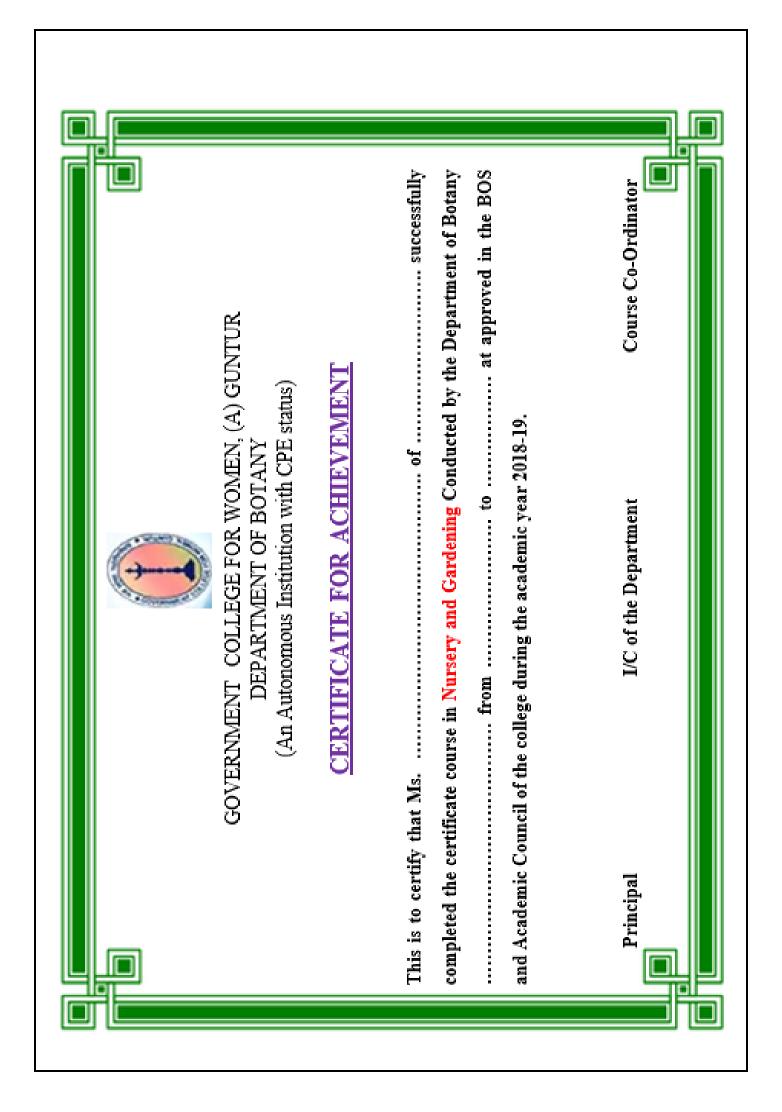
II. Short Answer questions. Write any 4 of the following

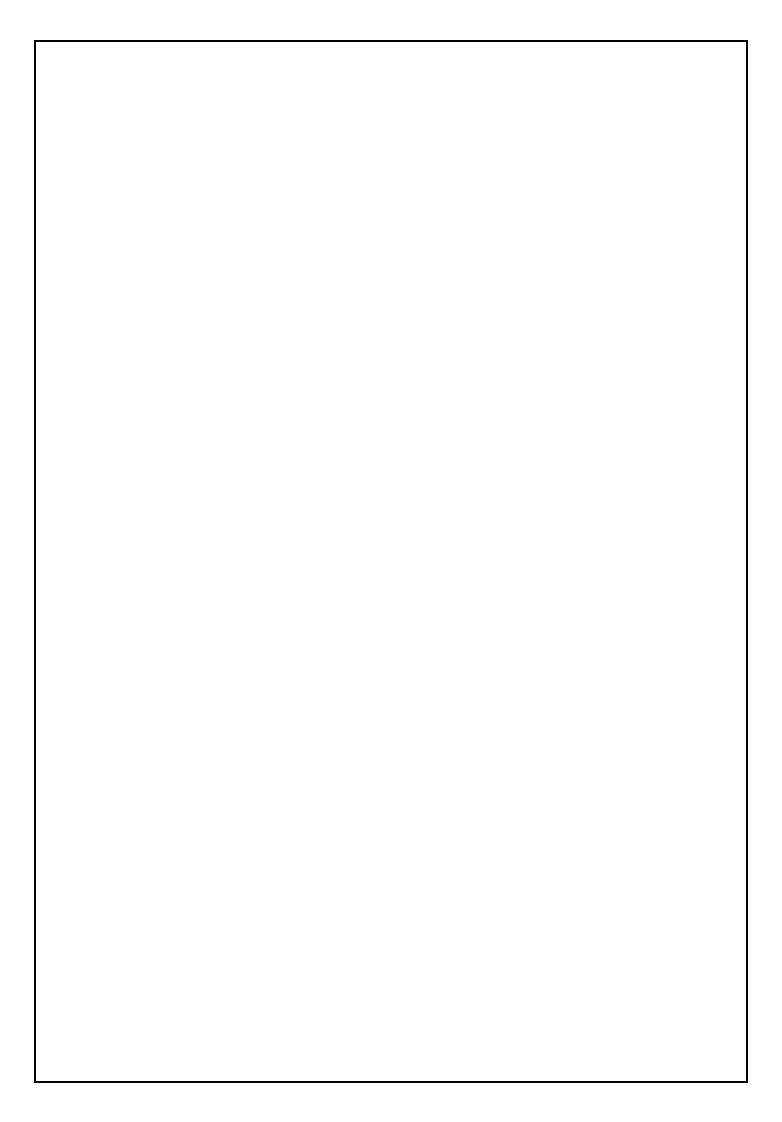
4x5 = 20M

- 1. Scope of Nursery
- 2. Types of Gardening.
- 3. Computer application in garden Designing.
- 4. Green House
- 5. Cultivation of Onion.

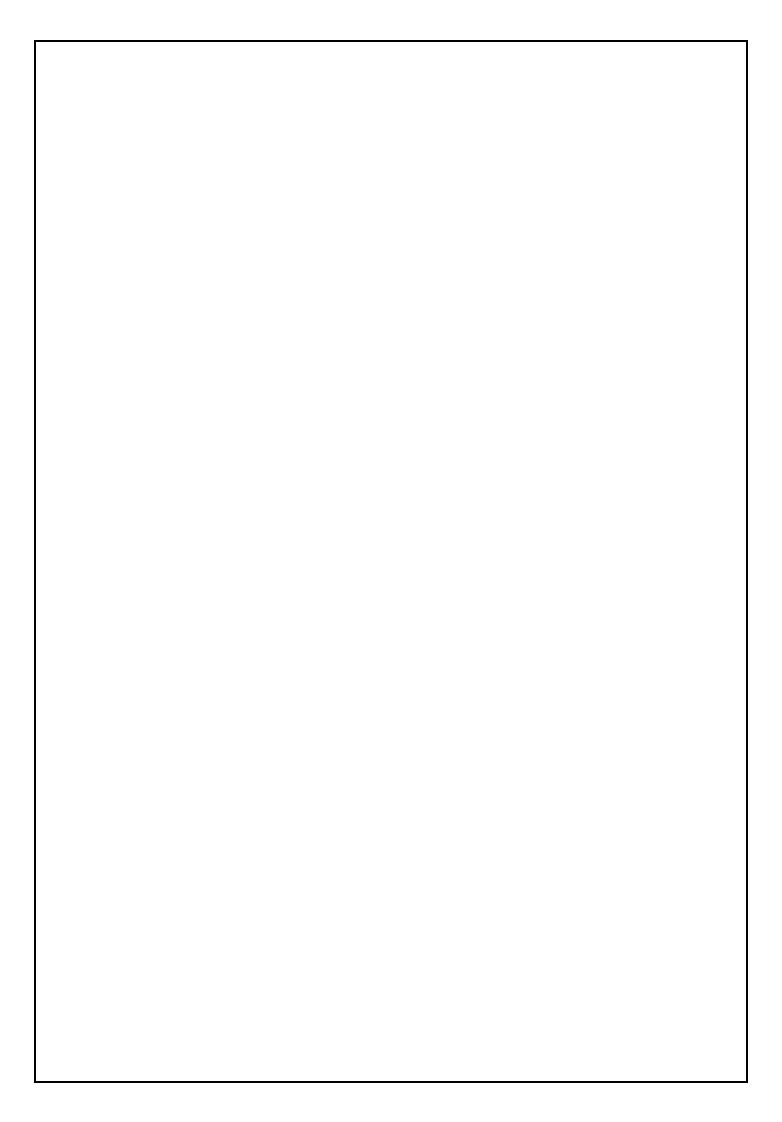
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