

※注意：作答時，請於答案卷上標明作答之大題及其題號。

一、配合題 (72%)

(一) 裸子植物 (自第三欄選出特徵適合的科號)

題號	特徵	科名
1	Leaves compound	1. Cycadaceae 蘇鐵科
2	Leaves fan-shaped with dichotomous venation	2. Cupressaceae 柏科
3	Xylem vessels present	3. Ephedraceae 麻黃科
4	Bract and ovuliferous scale distinct, leaves arranged in spirals or in fascicles	4. Ginkgoaceae 銀杏科
5	Bract and scale fused, leaves spiraled	5. Pinaceae 松科
6	Leaves scalelike, opposite or whorled	6. Podocarpaceae 羅漢松科
7	Seed enclosed or partially enclosed by a fleshy aril	7. Taxaceae 紅豆杉科
		8. Taxodiaceae 杉科

(二) 雙子葉離瓣花植物 (自第三欄選出特徵適合的科號)

題號	特徵	科名
8	Aquatic, leaves with blade submerged, floating, or emergent. Inflorescences of solitary flowers. Tepals 4-12, often petal-like.	1. Aceraceae 槭樹科
9	Trees; stipules present, surrounding the terminal bud. Flowers solitary. Tepals 6 to numerous, distinct. Stamens numerous, distinct; carpels usually numerous, distinct, on an elongate receptacle.	2. Cruciferae 十字花科
10	Trees or shrubs, aromatic; anthers opening by 2 or 4 uplifting valves.	3. Caryophyllaceae 石竹科
11	Mostly herbs. Perianth differentiated into calyx and corolla. Flower usually with spirally arranged, numerous stamens and carpels.	4. Cucurbitaceae 瓜科
12	Usually lianas with leaf-opposed tendrils. Inflorescences terminal, but usually appearing leaf-opposed. Petals sometimes deciduous as a cap. Fruit a berry.	5. Dros. eraceae 毛氈苔科
13	Insectivorous herbs, Leaves usually circinate, the blade sensitive and forming a snap trap or covered with mucilage-secreting hairs.	6. Euphorbiaceae 大戟科
14	Herbs or vines; nodes often swollen; often with oxalic acid. Stipules present and connate into an often thin sheath (ocrea) around the stem	7. Fagaceae 殼斗科
15	Trees, shrubs, herbs often with laticifers Flowers unisexual. Carpels usually 3, connate; ovary superior, usually 3-lobed.	8. Lauraceae 樟科
16	Leaves deciduous. Inflorescences erect to pendent catkins. Flowers unisexual, subtended by a usually hairy bract. Petals lacking. Seeds with basal tuft of hairs.	9. Magnoliaceae 木蘭科
17	Flowers often showy, with a hypanthium ranging from flat to cup-shaped or cylindrical. Stamens usually numerous; carpels 1 to many, distinct or connate, sometimes adnate to hypanthium.	10. Malvaceae 錦葵科
18	Vines, usually with spirally coiled and often branched tendrils, borne laterally at the nodes. Flowers unisexual; ovary half-inferior to inferior, with parietal placentation.	11. Moraceae 桑科
19	Trees or shrubs. Inflorescences often spicate, a catkin, or headlike cluster. Flowers unisexual; ovary inferior. Fruit a nut, closely associated with a spiny to scaly cupule.	12. Nymphaeaceae 睡蓮
20	Petals 4, distinct, often forming a cross. Stamens 6, the 2 outer shorter than the 4 inner (tetradynamous). Fruit a silique or silicle.	13. Passifloraceae 西番蓮科
21	Stamens numerous, filaments distinct, basally connate into a tube around the gynoecium (monadelphous).	14. Polygonaceae 蓼科
22	Trees or shrubs, with secretory cavities (pellucid dots) containing aromatic ethereal oils. Ovary superior, usually with axile placentation.	15. Ranunculaceae 毛茛科
23	Trees. Leaves opposite, usually with palmate venation. Fruit a winged schizocarp.	16. Rosaceae 薔薇科
		17. Rutaceae 芸香科
		18. Salicaceae 楊柳科
		19. Vitaceae 葡萄科

(三) 雙子葉合瓣花植物 (自第三欄選出特徵適合的科號)

題號	特徵	科名
24	Petals 5, forming a wheel-shaped, bell-shaped, funnel-shaped, or tubular corolla. Ovary superior. Ovules usually numerous in each locule. Fruit usually a berry.	1. Apocynaceae 夾竹桃科
25	Petals strongly connate and forming wheel-like, funnel-like, or tubular corolla. Inflorescences usually forming helicoid or scorpioid cymes.	2. Asteraceae 菊科
26	Leaves opposite or whorled; stipules present, interpetiolar. Petals connate; ovary inferior.	3. Boraginaceae 紫草科
27	Plants with laticifers and sap usually milky. Leaves opposite or whorled. Corolla wheel-shaped or funnel-shaped. Fruits often paired, each ovary usually developing into a fleshy or dry follicle.	4. Lamiaceae 唇形花科
28	Leaves usually opposite. Petals usually 4. Stamens 2; filaments adnate to corolla.	5. Oleaceae 木犀科
29	Leaves usually opposite, aromatic. Petals usually 2-lipped. Stamens 4, didynamous to equal. Ovary superior, usually deeply 4-lobed; style terminal to gynobasic.	6. Primulaceae 櫻草科
		7. Rubiaceae 茜草科
		8. Solanaceae 茄科

(四) 單子葉植物 (自第三欄選出特徵適合的科號)

題號	特徵	科名
30	Inflorescences forming a spike of numerous small flowers packed onto a fleshy axis (a spadix), which is subtended by a large leaflike to petal-like bract (a spathe)	1. Alismataceae 澤瀉科
31	Aquatic or wetland herbs. Perianth differentiated into a calyx and corolla. Sepals 3, petals 3, distinct. Stamens usually 6 to numerous, filaments distinct. Carpels 6 to numerous, distinct.	2. Amaryllidaceae 石蒜科
32	Herbs usually with bulbs. Tepals 6, distinct, petaloid. Stamens 6; filaments distinct. Ovary superior.	3. Araceae 天南星科
33	Leaves alternate, 2-ranked. Tepals 6, the outer sometimes differentiated from the inner, petaloid; ovary usually inferior.	4. Cyperaceae 莎草科
34	Twining vines with thick rhizomes. Fruit usually a triangular and 3-winged, loculicidal capsule.	5. Dioscoreaceae 薯蕷科
35	Stems usually triangular. Leaves 3-ranked. Each flower subtended by a bract (glume). Tepals usually reduced to bristles. Fruit an achene.	6. Iridaceae 鳶尾科
36	Aromatic herbs. Flowers bilateral. Stamen 1, grooved, grasping the style. Two larger staminodes usually form a liplike structure.	7. Liliaceae 百合科
		8. Poaceae 禾本科
		9. Zingiberaceae 薑科

二、解釋名詞 (28%)

1. Binomial nomenclature (3%)
2. Herbarium (3%)
3. Palynology (3%)
4. Holotype (3%)
5. Ecotype (4%)
6. Biological species (4%)
7. Phenetics (4%)
8. Phylogenetic classification (4%)