

状，二回小羽片約10对，長1—1.5厘米，寬5毫米，長圓形，先端有數鈍齒，基部不對稱，上側與小羽軸並行，下側直楔形，下延，有缺刻分開，基部的羽狀深裂；末回裂片倒卵形或近圓形，密接，全緣。羽片向頂部漸短，二回深羽裂，一回小羽片闊披針形，漸尖頭，末回裂片除下側全緣外，有鈍齒牙。葉脈下面微隆起，羽狀分叉，達於葉邊。葉草質，干後褐綠色，兩面几光滑，惟沿葉脈偶有短棕色毛貼生；葉軸和葉柄同色，仅向頂部有微毛，羽軸，小羽軸有棕色毛較為密生。孢子囊羣小，生末回裂片基部上側近缺刻處，每片1個；囊羣蓋半杯形，棕色，無毛。

产云南东南部(屏边县，大围山)。

本种近于热带鱗蓋蕨 *Microlepia speluncae* (Linn.) Moore, 但下面光滑无毛。

47. 毛闊葉鱗蓋蕨

Microlepia kurzii (Clarke) Bedd. Handb. Ferns Brit. Ind. (1883) 66; C. Chr. Ind. Fil. (1905) 426——*Davallia kurzii* Clarke in Trans. Linn. Soc. II, Bot. (1880) 446.

植株高达2米以上。根状莖粗硬，直徑2—3厘米，木質，淡褐色，密被黃棕毛。葉遠生，柄長約1米，基部粗1厘米左右，粗如拇指，密復棕毛，向上光滑。葉片長1米以上，三回羽狀，羽片7—9對，互生，相距14厘米，基部的長達60厘米，寬30厘米左右，長圓形，先端漸尖，深羽裂，柄長5厘米左右，二回羽狀深裂；一回小羽片10—12對，長15厘米左右，寬5—6厘米，闊披針形，漸尖頭，基部不等寬，上側平截，下側短楔形，柄長4—8毫米，几開展，相距5—6厘米，羽狀深裂几達小羽軸；末回羽片12—14對，互生，開展，上先出，基部上側一片特長，約3厘米，寬1.2—1.4厘米，卵狀長圓形，先端短尖，與葉軸並行，第二片向上和下側的長1.5—1.8厘米，寬約8毫米，長圓形或近於三角形，先端鈍，密接，向頂部漸變狹，匯合而成羽裂的長尖頭；末回裂片邊緣近全緣或有少數鈍鋸齒。葉脈較顯，側脈羽狀分枝，不到葉邊。葉草質，干後上面暗綠色，光滑無毛，下面黃綠色，密被棕色短柔毛；葉軸和葉柄同色，光滑，中部以上的羽軸和小羽軸密被棕色短毛。孢子囊羣圓形，位於末回羽片兩側的小脈頂端，3—5對，近葉邊着生；囊羣蓋腎形，密被棕色絨毛。

产云南西南部(瀘滄县)。生山峽中，海拔1300米。也广布于上緬甸。

本种形体酷似闊葉鱗蓋蕨 *M. platyphylla* (Don) J. Sm., 但葉質較薄，下面有短柔毛密生。

48. 云南鱗蓋蕨

Microlepia yunnanensis Ching, sp. nov.

根状莖橫走，粗約4毫米，稍有灰色毛或近光滑。葉近生，柄長40—50厘米，粗約3毫米，禾稈色或老禾稈色，稍有光澤，几光滑，略有粗糙的痕；葉片長70—80厘米，中部寬22厘米，長圓形，頂部漸尖，基部稍狹，三回羽狀；羽片約15對，互生，斜向上，下部的相距8厘米，上部的相距4厘米，彼此遠離，有短柄（長約4毫米），基部的長約10厘米，寬4—5厘米，長圓披針形，中部的最長，15—19厘米，寬3—4厘米，披針形或闊披針形，多少呈鐮刀狀，向先端為長漸尖頭，一回羽狀，基部闊楔形，几對稱，二回羽狀；一小羽片20余對，接近，開展，近于互生，基部上側一片較長，2.5—3厘米，寬約1厘米，披針形，漸尖頭，與葉軸接近且並行，其餘的向上漸短，長1.5—2厘米，闊披針形，寬約7—8毫米，鈍頭或急尖頭，基部不對稱，下側楔形，上側截形（即末回小羽片較長並與葉軸並行），几無柄，一回羽狀；末回小羽片6—7對，密接，長圓形，基部上側一片較長，7—8毫米，寬3毫米，其餘的小羽片較短，圓頭，全緣，基部合生，少有上側半分離。葉脈纖細，上下兩面不太明顯，斜出，分叉或單一，水囊細長，明顯。葉草質，干後綠色，兩面疏被貼生的短毛；葉軸及羽軸上密生淡棕色短柔毛。孢子囊羣疏生，每末回小羽片1—2個，生於基部上側一小脉；囊羣蓋小，杯形，有密毛。

產雲南東南部（蒙自新安鎮，烂木橋）。生林下陰濕山溝，海拔450米。

49. 疏毛鱗蓋蕨

Microlepia communis Ching, sp. nov.

根狀莖橫走，粗6—7毫米，分枝，黑褐色。葉疏生，柄長達40厘米，粗7毫米，灰褐色，無毛，略粗糙。葉片長逾1米，寬約40厘米，先端為羽狀尾頭，向下為三回深羽裂，基部為三回羽狀；羽片20—25對，基部一對特小，長不到10厘米，第二對以上長25—30厘米，基部寬8—9厘米，卵狀披針形，長尾頭，基部幾等寬，柄長1厘米，密生棕色短毛，互生，斜向上，相距8—13厘米，基部二回羽狀，向上為一回羽狀；一小羽片在羽狀尾頭以下約20對，接近，斜向上，互生，上先出，基部的長約5—6厘米，寬2厘米左右，闊披針形，有短柄，先端短尖或漸尖；向上的漸短，長2—3.5厘米，寬1厘米，長圓形，急尖或鈍頭，基部不等寬，上側平截與葉軸並行，下側廣楔形，几無柄，一回羽狀；末回羽片長圓形，先端圓或鈍，基部上側一片較大，長1.5厘米，寬8毫米，圓淺裂，其餘的較短小，全緣或僅上邊有一個矮缺刻。羽片向頂部漸短，密接几成復瓦狀，一回深羽裂，末回小羽片僅基部上方有2—3個圓裂片，其餘為全緣。葉脈下面微隆起，羽狀分枝，斜上，上面的小脈頂端有明顯的紡錘形水囊；中部以上的葉軸以及羽軸密被棕色短柔毛。葉草質，干後綠色，上面几光滑，惟沿小羽軸及葉脈偶有短棕毛貼生，下面有短毛疏生。孢子囊羣疏生，每末回小羽片1—4個，基部上側的一片常多至

Kwangsi, 45 km. north of Lu-chen, Tze-po, in wooded ravine, leg. R. C. Ching No. 5567, VI, 2, 1928.

41. *Microlepia intermedia* Ching, sp. nov.

Rhizomate late repente, tenui, 3 mm crasso, pilis griseo-brunneis luteis dense obtecto; frondibus distantibus, stipite 30—35 cm longo, 2 mm crasso, stramineo, subglabro aut persparse piloso; lamina 50—60 cm longa, 18—27 cm lata, oblonga, tripinnata; pinnis 10—12-jugis, alternis, obliquis, 7—8 cm a se distantibus, basalibus parum abbreviatis, mediis 16—20 cm longis, 5—7 cm latis, oblongo-lanceolatis, acuminatis, basi utrinque aequalibus, petiolo 5 mm longo suffultis; pinnulis primariis infra apicem pinnatifidum 12—14-jugis, basalibus longioribus, 3—3.5 cm longis, 1.2—1.5 cm latis, oblongo-lanceolatis, apice acutis vel breviter acuminatis, basi utrinque inaequalibus, sequentibus gradatim minoribus, subpatentibus, alternis, separatis, omnibus breviter petiolulatis (petiolulo alato et ad rachillam leviter decurrente); pinnulis (segmentis) ultimis 4—6-jugis, basali anteriori majore, 6—10 mm longa, 4—6 mm lata, oblonga, paucilobata, sequentibus gradatim minoribus, subintegris, omnibus margine crenulatis, basi decurrentibus; nervis flabellatim furcatis, infra prominulis, supra indistinctis; textura tenuiter herbacea, colore in sicco pallide viridi, paginis utrisque praesertim ad costulas nervasque subtus pilis mollibus, pallidis, luteis, adpressis sparse obtectis; soris parvis ad sinum segmentorum positis, indusiis brunneis, semicupuliformibus, sparse pilosis.

Kwangsi, north of Lu-chen, Chiao Tu, on old muddy wall, leg. R. C. Ching No. 5447, V, 28, 1928.

42. *Microlepia pingpienensis* Ching, sp. nov.

Rhizomate , stipite 50 cm vel ultra longo, 5 mm crasso, brunneo-stramineo, ad basin sparse strigoso, sursum nudo; lamina ca. 1 m longa, 60 cm lata, oblonga, acuminata, tripinnata; pinnis ca. 15-jugis, alternis, oblique patentibus, petiolatis (petiolo 5—7 mm longo), inferioribus ca. 20 cm a se distantibus, infimis paululum abbreviatis, mediis ca. 40—50 cm longis, 12—14 cm latis, late lanceolatis, acuminatis, basi utrinque aequali; pinnulis primariis ca. 20-jugis, 6—8 cm longis, 2.5 cm latis, lanceolatis, ad apicem longe acuminatis, basi utrinque fere aequali; pinnulis secundariis ca. 10-jugis, patentibus, 1—1.5 cm longis, 5 mm latis, oblongis, apice obtusis, minute dentatisque, basi inaequali, utroque profunde lobato-pinnatifidis; lobis ultimis oblongis vel obovatis, contiguis, denticulatis; nervis in lobis pinnatis, utrinque paulo prominulis; textura herbacea, colore in sicco obscure viridi, paginis praeter costas costulasque utrinque sparse breviter puberulas glabris; soris parvis, 1—2 pro lobo ad sinum positis, indusiis semicupuliformibus, pallide brunneis, glabris.

Yunnan austr.-orient., Ping-pien Hsien, 1000 m alt., leg. R. C. Ching No. 36, VII, 18, 1952.

45. *Microlepia yunnanensis* Ching, sp. nov.

Rhizomate repente, 4 mm crasso, sparse piloso vel subglabro; frondibus approximatis, stipite 40—50 cm longo, ca. 3 mm diametro, stramineo, subglabro, subnitido, parum scabro; lamina 70—80 cm longa, 22 cm medio lata, oblonga, acuminata, basin versus paululum angustata, tripinnata; pinnis ca. 15-jugis, obliquis, alternis, inferioribus 8 cm, sursum 4 cm a se distantibus, breviter petiolatis (petiolo 4 mm longo), basalibus ca. 10 cm longis, 4—5 cm latis, late lanceolatis, mediis similibus, 15—19 cm longis, 3—4 cm latis, ad apicem acumi-

natum parum falcatis, basi utrinque fere aequalibus, rotundato-cuneatis, bipinnatis; pinnulis primariis ca. 20-jugis, contiguis, patentibus, suboppositis, basali anteriori longiore 2.5—3 cm longa, ca. 1 cm lata, lanceolata, acuminata, erecta, rachim tegente, sequentibus brevioribus, 1.5—2 cm longis, 7—8 mm latis, apice acutis vel obtusiusculis, omnibus breviter petiolulatis, basi inaequalibus (latere anteriori auriculiformi, inferiori cuneata); pinnulis (segmentis) ultimis 6—7-jugis, contiguis, oblongis, basali anteriori majore, 7—8 mm longa, 3 mm lata, ceteris minoribus, integris, raro incisis, basi ad costam plus minusve decurrentibus; nervis tenuibus, utrinque indistinctis, obliquis, simplicibus aut furcatis, ad marginem apice elongato-incrassatis, superne pallidis, conspicuis; textura herbacea, colore sicco viridi, pagina supra ad nervas pilis sat longis, pallidis, adpressis persparsis, infra cum rachillis praesertim ad costas dense breviter puberula; soris parvis, in parte superiorum frondis sitis, sparsis, 1—2 pro segmento ad sinum positis, indusiis semicupuliformibus, dense puberulis.

Yunnan austr.-orient., Mengtze, Shing-an Chen, in wooded glens, leg. *Chu et Lee* No. 73, II, 15, 1954.

46. *Microlepia communis* Ching, sp. nov.

Species *M. yunnanensis* Ching valde affinis, differt pinnis latioribus et pinnulis basalibus quam sequentibus multo longioribus acuminatisque.

Rhizomate repente, 6—7 mm crasso, atro-brunneo; frondibus solitariis vel distantibus, stipe ad 40 cm longo, 7 mm diametro, atro-brunneo, primum dense strigoso, aetate nudescente laevique; lamina ad 1 m longa, 40 cm lata, apice longe acuminata vel subcaudata, basin versus tripinnata; pinnis 20—25-jugis, alternis, obliquis, inferioribus ca. 10 cm a se distantibus, infimis magis abbreviatis, ca. 10 cm longis, sequentibus multo longioribus, 25—30 cm longis, 8—9 cm basi latis, e basi latissima deltoideo-lanceolatis, apicem pinnatifidum versus gradatim acuminatis, petiolo 1 cm longo, dense piloso suffultis, parte inferiore bipinnata; pinnulis primariis ca. 20-jugis, contiguis, alternis, obliquis, anadromice dispositis, basalibus longioribus, 5—6 cm longis, 2 cm latis, lanceolatis, acuminatis, petiolulatis, sequentibus brevioribus sed conformibus, apice breviter acutis, supremis pinnatifidis, obtusiusculis, sessilibus vel leviter adnatis; segmentis ultimis in pinnulis basalibus 6—7-jugis, oblongis, obliquis, basali anteriori majore, ad 1.5 cm longa, 8 mm lata, lobato-incisa, ceteris minoribus, obtusis, integris vel pauci-lobulatis, margine integris; nervis in pinnulis ultimis vel segmentis pinnatis, nervulis simplicibus vel furcatis, obliquis, infra prominulis, supra intra marginem apice elongato-incrassatis, pallidis, conspicuis; textura herbacea, colore in sicco viridi, pagina supra praeter costas persparse pilosas glabra, infra praesertim ad costas costulasque pilis sat longis, pallidis, adpressis obiecta; soris magnis, superficialibus, 3—6 pro pinnula ultima, indusiis semicupuliformibus, virentibus, pilosis.

Yunnan austr., Se-song-ban-nan, Yunnan Complex Expedition No. 923 (typus), 733.

47. *Microlepia tripinnata* Ching, sp. nov.

Planta ad 1.5 m alta, stipite deest; lamina ultra 60 cm longa, 46 cm lata, tripinnata; pinnis numerosis, inferioribus suboppositis, 12—15 cm a se distantibus, superioribus alternis, approximatis, oblongo-lanceolatis, basalibus 30 cm longis, ca. 10 cm latis, petiolatis (petiolo 8 mm longo), mediis 25 cm longis, 6 cm latis, obliquis, longe acuminatis, petiolulatis (petiolo 5 mm longo), basi rotundo-cuneatis, utrinque fere aequalibus; pinnulis primariis ca. 20-jugis,