

## KEY TO GROUPS

1. Hymenophore lamellate or lamellate-like
  2. Lamellae daedeloid ..... *CORIOLACEAE*
  2. Lamellae not daedeloid
    3. Spore print white, pale yellow, pale lilac, greenish, or orange ..... GROUP 1
    3. Spore print differently colored
      4. Spore print pink, salmon, or flesh colored ..... GROUP 2
      4. Spore print darker
        5. Spore print black, dark brown, chocolate brown or purple brown ..... GROUP 3
        5. Spore print pale brown, yellow brown, cinnamon, or rusty brown ..... GROUP 4
  1. Hymenophore not lamellate or not exposed
    6. Hymenophore poroid, sometimes enclosed in a veil ..... GROUP 5
    6. Hymenophore not poroid, or if so then pores not readily visible
      7. Fungal bodies gelatinous ..... GROUP 6
      7. Fungal bodies textured differently
        8. Fungal bodies subterranean or nearly so ..... GROUP 7
        8. Fungal bodies terrestrial or arboreal
          9. Fungal bodies resupinate to effuso-reflexed, occasionally stipitate, or in fan- or spoon-shaped clusters ..... GROUP 8
          9. Fungal bodies other
            10. Fungal bodies gastroid, spore filled sacks ..... GROUP 9
            10. Fungal bodies not as above
              11. Fungal bodies coraloid ..... GROUP 10
              11. Fungal bodies not coraloid, variously shaped ..... GROUP 11

## GROUP 1

1. Lamellae fold or wrinkle-like
  2. Pileus brightly colored, typically yellowish to orange ..... *CANTHARELLACEAE*
  2. Pileus darker colored
    3. Basidioma blue to purple ..... *THELEPHORACEAE*
    3. Basidioma brown, gray, or black ..... *CRATERELLACEAE*
1. Lamellae not fold or wrinkle-like
  4. Lamellae platelike; basidioma, especially the stipe, snapping cleanly like chalk; stipe 3 mm or more thick ..... *RUSSULACEAE*
  4. Basidioma lacking above combination of characteristics
    5. Basidioma cantharelloid ..... *HYGROPHOROPSISACEAE*
    5. Basidioma not cantharelloid
      6. Basidioma pleurotoid
        7. Lamellae split, edges rolling over in dry weather ..... *SCHIZOPHYLLACEAE*
        7. Lamellae different
          8. Pileus surface smooth or fibrillose; spores inamyloid ..... *CREPIDOTACEAE*
          8. Pileus surface hairy or scaly, if smooth cracking at maturity; spores sometimes amyloid
            9. Spores amyloid ..... *LENTINELLACEAE*
            9. Spores inamyloid ..... *LENTINACEAE*

- 6. Basidioma agaricoid
  - 10. Lamellae soft, clean, waxy in appearance and texture; pileus often brightly colored; stipe more or less central; typically terrestrial..... *HYGROPHORACEAE*
  - 10. Basidioma lacking above combination of characteristics
    - 11. Lamellae adnexed to decurrent .....*TRICHOLOMATACEAE*
    - 11. Lamellae free
      - 12. Veil and volva present, volva sometimes reduced; pileus dry or viscid; spore print white or pallid.....*AMANITACEAE*
      - 12. Veil sometimes present, volva absent; pileus dry or slightly viscid; spore print white, buff, or greenish.....*LEPIOTACEAE*

## GROUP 2

- 1. Spore print pinkish, pinkish-buff, or pink tinted; lamellae gray or purple tinged .....*TRICHOLOMATACEAE*
- 1. Spore print somewhat darker; lamellae lacking the gray or purple tints
  - 2. Lamellae free at maturity; volva sometimes present; on wood.....*PLUTEACEAE*
  - 2. Lamellae attached; volva rarely present; rarely on wood .....*ENTOLOMATACEAE*

## GROUP 3

- 1. Basidioma pleurotoid.....*CREPIDOTACEAE*
- 1. Basidioma agaricoid
  - 2. Spore print black, smoky-gray to olive-gray
    - 3. Lamellae decurrent, sometimes adnate, not deliquescing; basidioma tough not fragile ..... *GOMPHIDIACEAE*
    - 3. Lamellae not decurrent, sometimes deliquescing; basidioma fragile .....*COPRINACEAE*
  - 2. Spore print dark brown, chocolate brown, or purple brown
    - 4. Lamellae free or nearly so at maturity, white to pinkish when young darkening with age, sometimes blood red at maturity; veil present, frequently forming an annulus.....*AGARICACEAE*
    - 4. Basidioma lacking above combination of characteristics
      - 5. Lamellae decurrent or easily separated from the context; pileus typically dull colored.....*PAXILLACEAE*
      - 5. Lamellae typically attached, not easily separating from the context; pileus often brightly colored.....*STROPHARIACEAE*

## GROUP 4

- 1. Parasitic on other fungi; brown spore deposit comprised of chlamydospores .....*TRICHOLOMATACEAE*
- 1. Not parasitic on other fungi
  - 2. Stipe rudimentary; basidioma pleurotoid; on wood
    - 3. Lamellae forked, cross veined, or somewhat poroid .....*PAXILLACEAE*
    - 3. Lamellae different .....*CORTINARIACEAE*
  - 2. Stipe well developed; basidioma agaricoid or cantharelloid

- 4. Basidioma small, often withering quickly; pileus oval, conical, or bell-shaped; on grass, dung, humus, or in gardens .....*BOLBITACEAE*
- 4. Basidioma lacking above combination of characteristics
  - 5. Lamellae not decurrent, not forked; veil typically present, at least when young; spore print brownish ..... *CORTINARICEAE*
  - 5. Lamellae typically decurrent, often forked; veil typically absent; spore print pale tan, yellowish to brownish or ochraceous
    - 6. Basidioma cantharelloid ..... *GOMPHACEAE*
    - 6. Basidioma agaricoid ..... *PAXILLACEAE*

## GROUP 5

- 1. Basidioma stipitate, decaying quickly, frequently parasitize; terrestrial, typically not growing on wood, associated with woodlands and typically mycorrhizal; tubes easily separated from the context; pileus soft; spore print easily obtained
  - 2. Basidioma misshaped and irregular
    - 3. Spore print white ..... *SCUTIGERACEAE*
    - 3. Spore print brownish *XEROCOMACEAE*
  - 2. Basidioma regularly shaped
    - 4. Spore print white ..... *SCUTIGERACEAE*
    - 4. Spore print brownish, sometimes olive colored
      - 5. Stipe slender ..... *XEROCOMACEAE*
      - 5. Stipe stout ..... *BOLETACEAE*
- 1. Basidioma lacking above combination of characteristics
  - 6. Context xanthochroic
    - 7. Basidioma woody, or coriaceous and terrestrial ..... *HYMENOCHAETACEAE*
    - 7. Basidioma coriaceous, typically arboreal, rarely terrestrial ..... *CORIOLACEAE*
  - 6. Context not xanthochroic
    - 8. Basidioma stipitate
      - 9. Stipe typically with a black crust, especially basally ..... *POLYPORACEAE*
      - 9. Stipe lacking a black crust ..... *CORIOLACEAE*
    - 8. Basidioma not stipitate
      - 10. Pileus surface with a hard, often waxy crust ..... *GANODERMATACEAE*
      - 10. Pileus surface lacking a hard, waxy crust ..... *CORIOLACEAE*

## GROUP 6

- 1. Basidioma typically ear-shaped ..... *AURICULARIACEAE*
- 1. Basidioma shaped differently
  - 2. Basidioma gumdrop-shaped, coraloid, or knoblike ..... *DACRYMYCETACEAE*
  - 2. Basidioma shaped differently
    - 3. Basidioma folded, wavy, appearing blob, to brainlike; reviving when dry ..... *TREMELLACEAE*
    - 3. Basidioma stipitate and spinate or cushionlike and sessile; not typically reviving when dry ..... *EXIDIACEAE*



- 23. Lacking above combination of characteristics
- 24. Spore mass brown to cinnamon brown ..... *HYMENOGASTACEAE*
- 24. Spore mass golden yellow to yellow-orange.....*OCTAVIANIACEAE*

## Group 8

- 1. Fungus obviously parasitic on vascular plants; ascoma thick and rigid, occasionally hairy, frequently rupturing the host plant peridium .....*VENTURIACEAE*
- 1. Fungus not obviously parasitic; fruiting bodies various
  - 2. Context releasing a green pigment with KOH
    - 3. Spore print white or pale golden brown; hymenophore spinate .....*BANKERACEAE*
    - 3. Spore print deep brown; hymenophore smooth to papillate, rarely tubulate or lamellate ..*THELOPHORACEAE*
  - 2. Context not releasing a green pigment
    - 4. Pileus zoned; context dimitic or trimitic .....*STEREACEAE*
    - 4. Pileus not zoned; context not as above
      - 5. Typically resupinate; margins uplifted of fused to nearby margins; spore print unobtainable.....*CORTICIACEAE*
      - 5. Basidioma lacking above combination of characteristics
        - 6. Spores yellow brown; fungus typically attacking structural or dead standing timber*CONIOPHORACEAE*
        - 6. Spores hyaline; fungus typically attacking living trees..... *MERULIACEAE*

## GROUP 9

- 1. Basidioma truly stipitate
  - 2. Pileus opening to expose discs or spore mass composed of lamellae, capsules or peridioles
    - 3. Spore mass composed of capsules or peridioles
      - 4. Stipe dehiscent.....*SECOTIACEAE*
      - 4. Stipe indehiscent..... *PELLORINIACEAE*
    - 3. Spore mass lamellate or on discs
      - 5. Spore mass not exposed at maturity.....*SECOTIACEAE*
      - 5. Spore mass exposed at maturity
        - 6. Veil present.....*SECOTIACEAE*
        - 6. Veil absent.....*PODAXACEAE*
  - 2. Spore mass powdery
    - 7. Spore case rupturing around the rim or via several pores..... *BATTAREACEAE*
    - 7. Spore case rupturing differently .....*TULOSTOMATAACEAE*
- 1. Basidioma sessile, thickened base often present, or outer peridium splitting into rays and lifting the spore case above the substrate
  - 8. Outer peridium splitting into rays.....*ASTRAEACEAE*
  - 8. Outer peridium not splitting into rays
    - 9. Gleba colored and firm or of peridioles when immature.....*SCLERODERMATAACEAE*
    - 9. Gleba white and firm, lacking peridioles when immature
      - 10. Basidioma rupturing in irregular fissures; fissures sometimes forming rays.....*MYCENASTRACEAE*
      - 10. Basidioma rupturing differently; fissures never forming rays..... *LYCOPERDACEAE*

## GROUP 10

1. Fruiting body highly branched; branches flattened, noodle-like..... *SPARASSIDACEAE*
1. Fruiting body simple to highly branched; branches not flattened and noodle-like
  2. Fruiting body black, branched or not, frequently coated, especially apically, with gray, white, or brown conidiospores ..... *XYLARIACEAE*
  2. Fruiting body not as above
    3. Basidioma highly branched; basidia bearing branch tips turning greenish or bluish with FeSO<sub>4</sub>; spore print yellow brown or ochraceous ..... *RAMARIACEAE*
    3. Basidioma simple to highly branched; basidia bearing tips not turning color with FeSO<sub>4</sub>, or if so then not highly branched; spore print white ..... *CLAVARIACEAE*

## GROUP 11

1. Fruiting body various but not cupulate, dislike, or nest-like
  2. Fruiting body spheroid, black, charcoal-like ..... *XYLARIACEAE*
  2. Fruiting body not as above
    3. Hymenophore spinate
      4. Context turning olive or black with KOH ..... *THELEPHORACEAE*
      4. Context not turning with KOH ..... *HYDNACEAE*
    3. Hymenophore not spinate
      5. Fruiting body emerging from a subterranean “egg”; spore mass slimy, very odiferous ..... *PHALLACEAE*
      5. Fruiting body different; spores forcibly discharged and not in a slimy mass
        6. Stipe hollow or stuffed; pileus sponge or thimble-like ..... *MORCHELLACEAE*
        6. Stipe solid or convoluted; pileus saddle-shaped, folded, convoluted or brainlike ..... *HELVELLACEAE*
  1. Fruiting body cupulate, disc-shaped, or nest-like
    7. Fruiting body nest-like; spores contained at the bottom in egg-like peridioles ..... *NIDULARIACEAE*
    7. Fruiting body cupulate or disc-shaped; spores not contained in peridioles
      8. Fruiting body minute to small; shortly stipitate; dull colored, frequently pale; on dead wood, bark, or living conifers and causing a canker ..... *HYLOSCYPHACEAE*
      8. Fruiting body lacking above combination of characteristics
        9. Fruiting body distinctly stipitate
          10. Asci amyloid, at least apically ..... *PEZIZACEAE*
          10. Asci inamyloid
            12. ascospores with 1-3 large oil droplets ..... *HELVELLACEAE*
            12. ascospores lacking the large oil droplets ..... *MORCHELLACEAE*
        9. Fruiting body sessile or not distinctly stipitate
          13. Asci amyloid, at least apically ..... *PEZIZACEAE*
          13. Asci inamyloid
            14. Typically brightly colored; often hairy marginally or on the outer surface ..... *OTIDEACEAE*
            14. Typically dull colored; hairs lacking ..... *HELVELLACEAE*