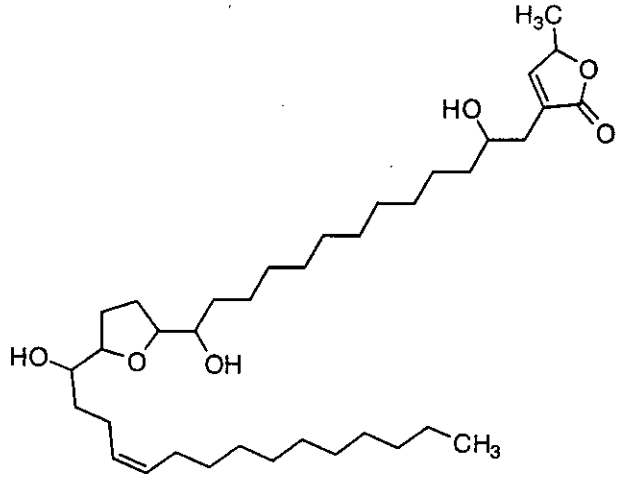
[構造式]

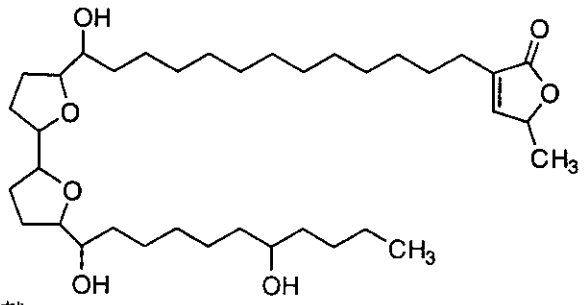


[分子式]$C_{37}H_{66}O_6$
[分子量]606.925
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[融点]Mp 54-55 ℃
[比旋光度]:[α]$_D$ +17 (c, CH_2Cl_2)
[溶解性]BERDY SOL: メタノール, ヘキサンに可溶; 水に難溶
UV: [neutral] λ $_{max}$ 230 (log ε 2.93) (MeOH)
[neutral] λ $_{max}$ 230 (ε 851) (MeOH) (Berdy)

----------文 献----------

Woo, M.H. et al., Heterocycles, 1995, 41, 1731-1742, (分離, UV, IR, H-NMR, C13-NMR, Mass)

§ Asiminocin; 24-Epimer
[化学名・別名]Bullanin
[CAS No.]158446-27-6
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

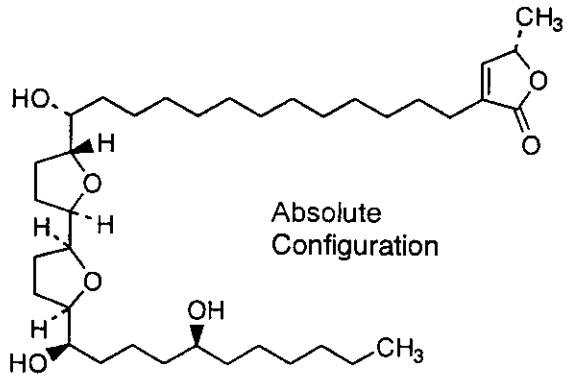


[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[基原]*Asimina triloba* (バンレイシ科)の茎皮
[用途]細胞毒
[性状]ワックス
[比旋光度]:[α]$_D$ +28 (EtOH)
UV: [neutral] λ $_{max}$ 213 (ε 220) (EtOH) [neutral] λ $_{max}$ 220 (ε 263) (EtOH) (Berdy)
[その他のデータ]Both C-30 epimers are known

----------文 献----------

Zhao, G.X. et al., Heterocycles, 1994, 38, 1897, (Bullanin)

§ Asitribin
[CAS No.]168113-64-2
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

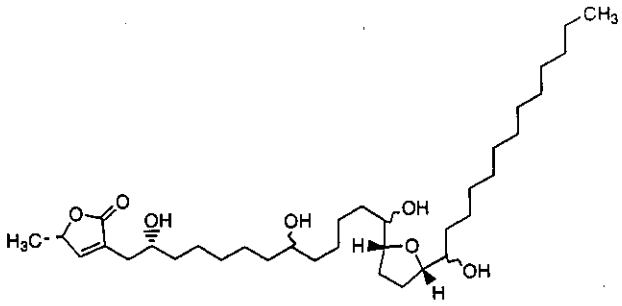


[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[融点]Mp 71-72 ℃
[比旋光度]:[α]$_D$ +15 (c, 0.1 in CH_2Cl_2)
[溶解性]BERDY SOL: メタノール, ヘキサンに可溶; 水に難溶
UV: [neutral] λ $_{max}$ 234 (ε 3550) (MeOH) (Berdy)

----------文 献----------

Woo, M.H. et al., Heterocycles, 1995, 41, 1731, (Asitribin)

[構造式]
[分子式]$C_{35}H_{64}O_7$
[分子量]596.886

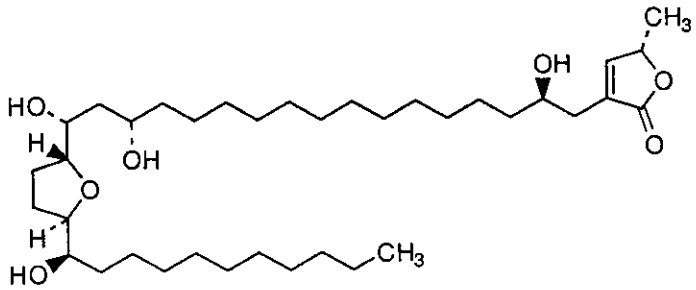


[基原]*Asimina triloba* の種子
[性状]無定型の粉末
[融点]Mp 65.3-68.4 ℃
[比旋光度]:[α]$_D^{22}$ +23.3 (c, 0.03 in CH_2Cl_2)
UV: [neutral] λ $_{max}$ 226 (log ε 4.1) (MeOH)

----------文献----------

Woo, M.-H. et al., Phytochemistry, 1999, 50, 1033-1040, (分離, UV, IR, H-NMR, C13-NMR, Mass)

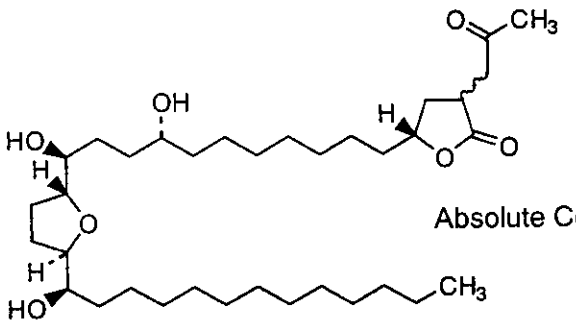
§ Asitrilobin D
[化合物分類]ポリケチド
(Annonaceae acetogenins)
[構造式]
[分子式]$C_{37}H_{68}O_7$
[分子量]624.94
[基原]*Asimina triloba*
[用途]細胞毒
[性状]粉末
[融点]Mp 87.2-88.1 ℃
[比旋光度]:[α]$_D^{20}$ -4 (c, 0.005 in CH_2Cl_2)
UV: [neutral] λ $_{max}$ 226 (log ε 3.7) (MeOH)



----------文献----------

Woo, M.-H. et al., Bioorg. Med. Chem., 2000, 8, 285-290

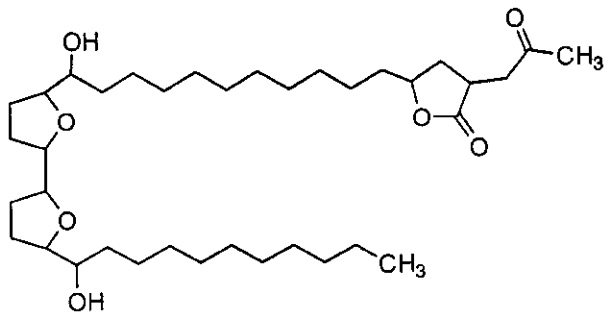
§ Asitrocinone
[化合物分類]ポリケチド
(Annonaceae acetogenins)
[構造式]
[分子式]$C_{35}H_{64}O_7$
[分子量]596.886
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[比旋光度]:[α]$_D^{23}$ +13.2 (c, 0.005 in CH_2Cl_2)
UV: [neutral] λ $_{max}$ 205 (log ε 3.6) (MeOH)
[その他のデータ]2,4-*cis*- と *trans*-isomers の混合物



----------文献----------

Kim, E.-J. et al., J. Nat. Prod., 2000, 63, 1503-1506

§ Bullatacinone; 24-Epimer
[化学名・別名]Asimicinone
[その他の CAS No.]179601-77-5, 179601-78-6
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[基原]*Asimina triloba*
[用途]細胞毒
[その他のデータ]2,4-*cis*- と *trans*- isomers の混合物として得られる



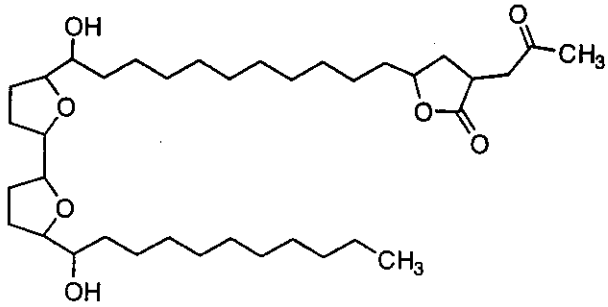
----------文献----------

UV: [neutral] λ_{max} 205 (log ε 3.6) (MeOH)
[その他のデータ]2,4-*cis*- と *trans*-isomers の混合物

----------文 献----------

Kim, E.-J. et al., J. Nat. Prod., 2000, 63, 1503-1506

§ Bullatacinone; 24-Epimer

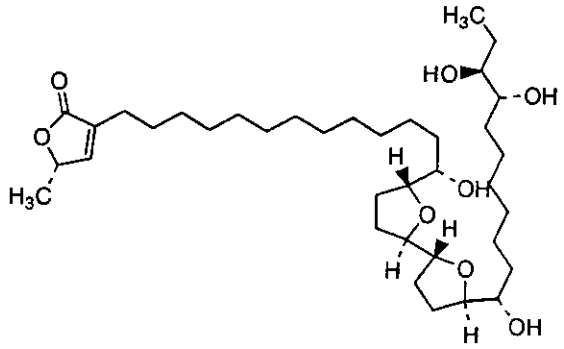


[化学名・別名]Asimicinone
[その他の CAS No.]179601-77-5, 179601-78-6
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[基原]*Asimina triloba*
[用途]細胞毒
[その他のデータ]2,4-*cis*- と *trans*- isomers の混合物として得られる

----------文 献----------

Zhao, G.-X. et al., Nat. Toxins, 1996, 4, 128-134, (Asimicinone)

§ Bullatetrocin

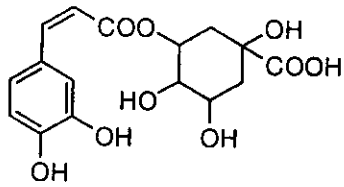


[CAS No.]184288-37-7
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{37}H_{66}O_8$
[分子量]638.924
[基原]*Asimina triloba*
[用途]細胞毒
[性状]ワックス
[比旋光度]:$[\alpha]_D^{22}$ +16.3 (c, 0.3 in $CHCl_3$)

----------文 献----------

He, K. et al., J. Nat. Prod., 1996, 59, 1029-1034, (分離, IR, H-NMR, C13-NMR, Mass)

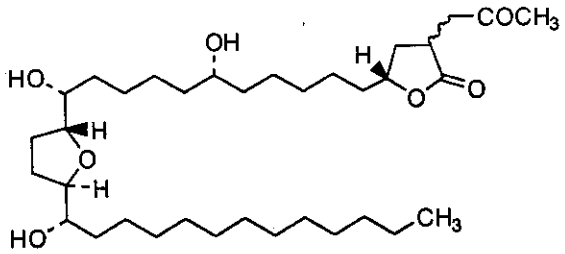
§ 3-*O*-Caffeoylquinic acid; (*E*)-form, 3-Epimer



[化学名・別名]3-*O*-Caffeoyl-*muco*-quinic acid
[化合物分類]脂肪族化合物(Monocarbocyclic carboxylic acids and lactones)
[構造式]
[分子式]$C_{16}H_{18}O_9$
[分子量]354.313
[基原]*Asimina triloba*
[性状]粉末
UV: [neutral] λ_{max} 225 ; 325 (MeOH)

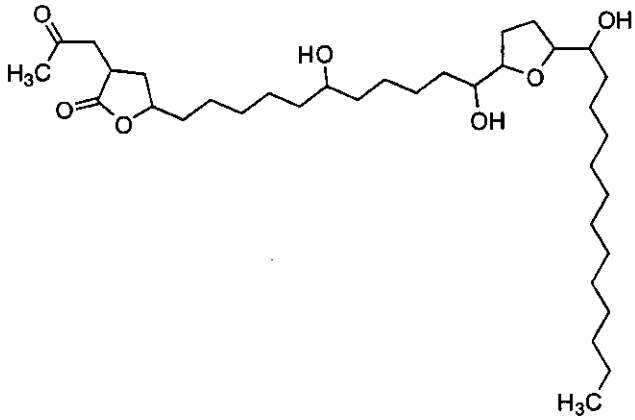
----------文 献----------

Karrer, W. et al., Konstitution und Vorkommen der Organischen Pflanzenstoffe, 2nd edn., Birkhäuser Verlag, Basel, 1972, no. 990, (生育)
Shatokhina, R.K. et al., Khim. Prir. Soedin., 1974, 10, 518; Chem. Nat. Compd. (Engl. Transl.), 1974, 10, 525, (3-*O*-Sinapoylquinic acid)
Herrmann, K., Prog. Chem. Org. Nat. Prod., 1978, 35, 73, (レビュー)

[関連 CAS No.] 152784-18-4, 152784-19-5, 84-21-9, 152784-22-0
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

[分子式]$C_{35}H_{64}O_7$
[分子量]596.886
[基原]*Annona muricata, Asimina triloba*
[融点]Mp 91-92 ℃
[比旋光度]:[α]$_D$ +20 (c, 0.2 in $CHCl_3$)

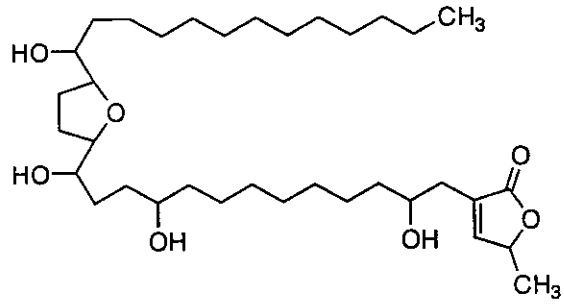
----------文献----------

Xu, L.-X. et al., J.O.C., 1989, 54, 5418, (分離, H-NMR, C13-NMR, 構造決定)
Zhao, G.-X. et al., Phytochemistry, 1993, 33, 1065, (分離, 構造決定)
Wu, F.E. et al., J. Nat. Prod., 1995, 58, 1430, (分離, H-NMR, C13-NMR)

§ Isoannonacin A; 20-Epimer
[化学名・別名]Isoannonacin
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

[分子式]$C_{35}H_{64}O_7$
[分子量]596.886
[基原]次の植物から分離: *Annona densicoma*, *Anno*
na muricata, *Asimina longifolia*, *Asimina triloba*
[用途]細胞毒
[性状]結晶
[融点]Mp 96-98 ℃
[比旋光度]:[α]$_D^{20}$ +24.8 (c, 0.1 in MeOH)
[溶解性]BERDY SOL: メタノール, ベンゼン, クロ
ロホルムに可溶; ヘキサンに易溶; 水に難溶
UV: [neutral] λ $_{max}$ (MeOH) (Berdy)
[その他のデータ]2,4-*cis*- と *trans*-isomers の混合物として得られる

----------文献----------

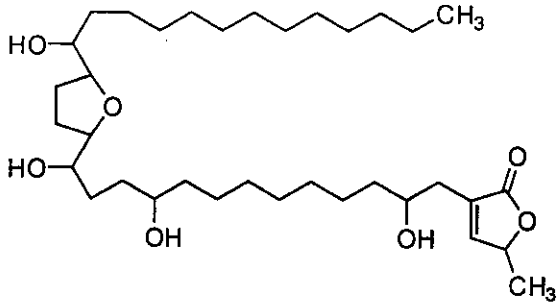
Xu, L.-X. et al., J.O.C., 1989, 54, 5418, (分離, H-NMR, C13-NMR, 構造決定)
Zhao, G.-X. et al., Phytochemistry, 1993, 33, 1065, (分離, 構造決定)
Wu, F.E. et al., J. Nat. Prod., 1995, 58, 1430, (分離, H-NMR, C13-NMR)

§ Javoricin; 15-Epimer
[化学名・別名]Asitrocin
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

[分子式]$C_{35}H_{64}O_7$
[分子量]596.886
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[融点]Mp 66.5-67.2 ℃
[比旋光度]:[α]$_D^{22}$ +5.2 (c, 0.01 in CH_2Cl_2)
UV: [neutral] λ $_{max}$ 215 (log ε 3.4) (MeOH)

----------文献----------

Rieser, M.J. et al., J. Nat. Prod., 1996, 59, 100, (分離, UV, IR, H-NMR, C13-NMR, Mass)
Kim, E.-J. et al., J. Nat. Prod., 2000, 63, 1503-1506, (Asitrocin)

§ Javoricin; 15-Epimer

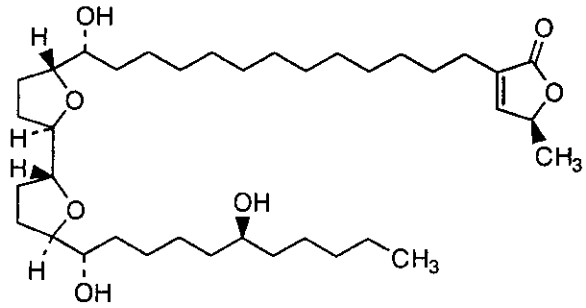


[化学名・別名]Asitrocin
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{35}H_{64}O_7$
[分子量]596.886
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[融点]Mp 66.5-67.2 ℃
[比旋光度]:[α]$_D^{22}$ +5.2 (c, 0.01 in CH_2Cl_2)
UV: [neutral] λ $_{max}$ 215 (log ε 3.4) (MeOH)

----------文 献----------

Rieser, M.J. et al., J. Nat. Prod., 1996, 59, 100, (分離, UV, IR, H-NMR, C13-NMR, Mass)
Kim, E.-J. et al., J. Nat. Prod., 2000, 63, 1503-1506, (Asitrocin)

§ Motrilin



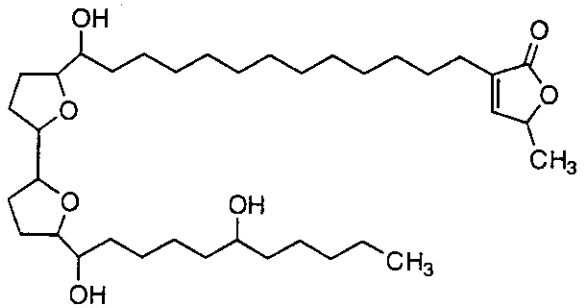
[化学名・別名]Annonin III. Squamocin C
[CAS No.]138551-27-6
[関連 CAS No.]141505-62-6
[その他の CAS No.]157084-75-8
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[一般的性質]化学構造は次の化合物とよく似ている: Narumicin I, Squamostatin A
[基原]次の植物から分離: *Annona cherimolia*, *Annona squamosa*, *Asimina triloba*
[用途]細胞毒
[融点]Mp 50-51 ℃
[比旋光度]:[α]$_D$ +19.5 (c, 0.9 in MeOH)
UV: [neutral] λ $_{max}$ 210 (ε 7000) (MeOH) [neutral] λ $_{max}$ 211 (ε 11800) (EtOH) (Berdy)

----------文 献----------

Sahai, M. et al., Chem. Pharm. Bull., 1994, 42, 1163-1174, (Squamocin C)

§ Motrilin; 24-Epimer

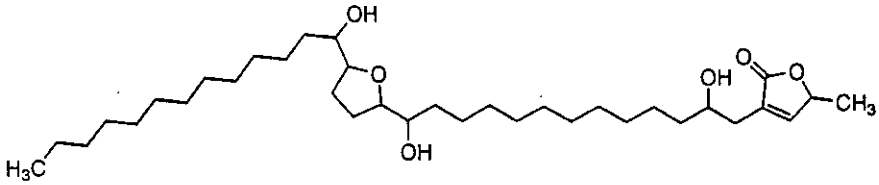


[化学名・別名]Asiminecin
[CAS No.]156256-35-8
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[基原]*Asimina triloba*
[用途]細胞毒
[性状]ワックス
[比旋光度]:[α]$_D$ +22 ($CHCl_3$)
UV: [neutral] λ $_{max}$ 215 (MeOH) [neutral] λ $_{max}$ 215 (MeOH) (Berdy)

----------文 献----------

Cortes, D. et al., Tetrahedron, 1991, 47, 8195-8202, (分離, H-NMR, C13-NMR)
Sahai, M. et al., Chem. Pharm. Bull., 1994, 42, 1163-1174, (Squamocin C)
Zhao, G.-X. et al., J. Med. Chem., 1994, 37, 1971-1976, (Asiminecin)
Cave, A. et al., Prog. Chem. Org. Nat. Prod., 1997, 70, 81-288, (レビュー)
Queiroz, E.F. et al., J. Nat. Prod., 1998, 61, 34, (Carolin B)

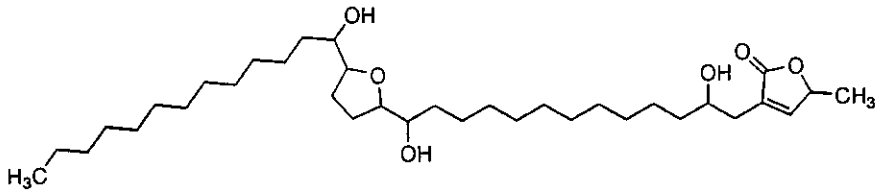
[化学名・別名]16,19-*cis*-Murisolin
[CAS No.]170554-60-6
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{35}H_{64}O_6$
[分子量]580.887
[基原]*Asimina triloba*(パンレイシ科)
[用途]細胞毒
[性状]無定型
[融点]Mp 67-68 ℃
[比旋光度]:[α]$_D$ +11 (c, 0.1 in CH_2Cl_2)
UV: [neutral] λ $_{max}$ 228 (ε 38300) (MeOH) (Berdy)



----------文献----------

Myint, S.H. et al., Heterocycles, 1990, 31, 861, (分離, H-NMR, C13-NMR)
Zhang, L. et al., Zhiwu Xuebao, 1993, 35, 390; CA, 120, 129491, (Howiicin B)
Woo, M.H. et al., Bioorg. Med. Chem. Lett., 1995, 5, 1135, (分離, H-NMR, C13-NMR)

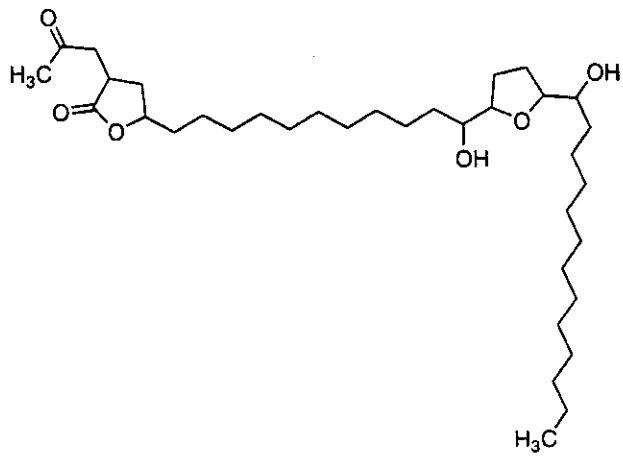
§ Murisolin; Diastereoisomer
[化学名・別名]Murisolin A
[CAS No.]170720-10-2
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{35}H_{64}O_6$
[分子量]580.887
[基原]*Asimina triloba*(パンレイシ科)
[用途]細胞毒
[性状]粉末
[融点]Mp 83-84 ℃
[比旋光度]:[α]$_D$ +17 (c, 0.1 in $CHCl_3$)
UV: [neutral] λ $_{max}$ 226 (ε 1050) (MeOH) [neutral] λ $_{max}$ 226 (ε 10800) (MeOH) (Berdy)
[その他のデータ]Has the *erythro*-config. between C-15 and C-16 or C-19 and C-20



----------文献----------

Myint, S.H. et al., Heterocycles, 1990, 31, 861, (分離, H-NMR, C13-NMR)
Zhang, L. et al., Zhiwu Xuebao, 1993, 35, 390; CA, 120, 129491, (Howiicin B)
Woo, M.H. et al., Bioorg. Med. Chem. Lett., 1995, 5, 1135, (分離, H-NMR, C13-NMR)

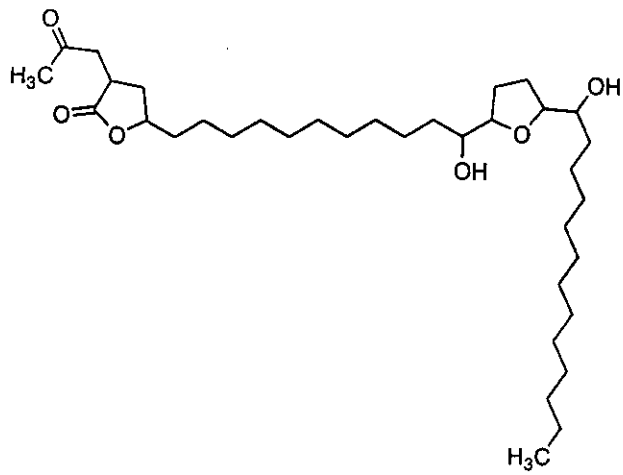
§ Murisolinone; (2*R*,4*R*,15*R*,16*R*,19*R*,20*R*)-form
[化学名・別名]*cis*-Murisolinone
[CAS No.]172489-11-1
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{35}H_{64}O_6$
[分子量]580.887
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[融点]Mp 92-93 ℃
[比旋光度]:[α]$_D$ +13.3 (c, 0.1 in CH_2Cl_2)
[溶解性]BERDY SOL: メタノール, クロロホルムに可溶
UV: [neutral] λ $_{max}$ 220 (log ε 3.8) (MeOH) [neutral] λ $_{max}$ 220 (ε 6310) (MeOH) (Berdy)



----------文献----------

Woo, M.H. et al., J. Nat. Prod., 1995, 58, 1533, (分離, H-NMR, C13-NMR, 絶対構造)

§ **Murisolinone; (2*R*,4*R*,15*R*,16*R*,19*R*,20*R*)-form**

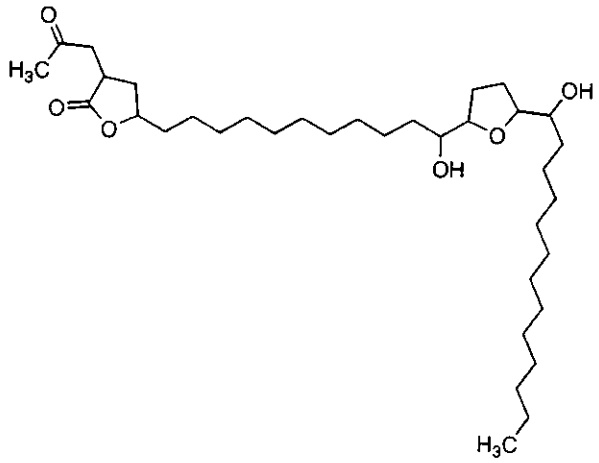


[化学名・別名]*cis*-Murisolinone
[CAS No.]172489-11-1
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{35}H_{64}O_6$
[分子量]580.887
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[融点]Mp 92-93 ℃
[比旋光度]:[α]$_D$ +13.3 (c, 0.1 in CH_2Cl_2)
[溶解性]BERDY SOL: メタノール, クロロホルムに可溶
UV: [neutral] λ $_{max}$ 220 (log ε 3.8) (MeOH) [neutral] λ $_{max}$ 220 (ε 6310) (MeOH) (Berdy)

----------文献----------

Woo, M.H. et al., J. Nat. Prod., 1995, 58, 1533, (分離, H-NMR, C13-NMR, 絶対構造)
Chang, F.-R. et al., Phytochemistry, 1998, 47, 1057-1061, (Isomurisolenin)

§ **Murisolinone; (2*R*,4*S*,15*R*,16*R*,19*R*,20*R*)-form**



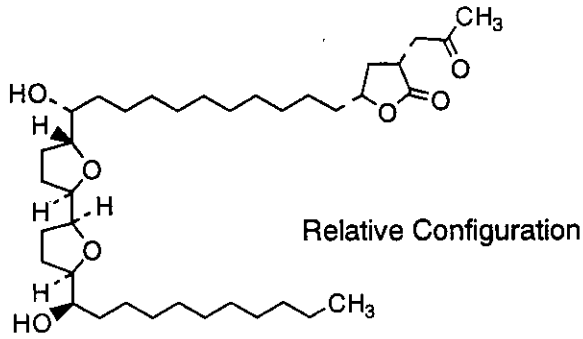
[化学名・別名]*trans*-Murisolinone
[CAS No.]172489-12-2
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]
[分子式]$C_{35}H_{64}O_6$
[分子量]580.887
[基原]*Asimina triloba* の種子
[用途]細胞毒
[性状]粉末
[融点]Mp 101-102 ℃
[比旋光度]:[α]$_D$ +20 (c, 0.1 in CH_2Cl_2)
[溶解性]BERDY SOL: メタノール, クロロホルムに可溶
UV: [neutral] λ $_{max}$ 218 (log ε 3.43) (MeOH) [neutral] λ $_{max}$ 218 (ε 2690) (MeOH) (Berdy)

----------文献----------

Woo, M.H. et al., J. Nat. Prod., 1995, 58, 1533, (分離, H-NMR, C13-NMR, 絶対構造)
Chang, F.-R. et al., Phytochemistry, 1998, 47, 1057-1061, (Isomurisolenin)

§ **Squamolone**
[化学名・別名]2-Oxo-1-pyrrolidinecarboxamide(CAS 名), 1-Carbamoyl-2-pyrrolidone
[CAS No.]40451-67-0

§ **2,4-*cis*-Trilobacinone**
[CAS No.]189686-30-4
[その他の CAS No.]189157-73-1
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

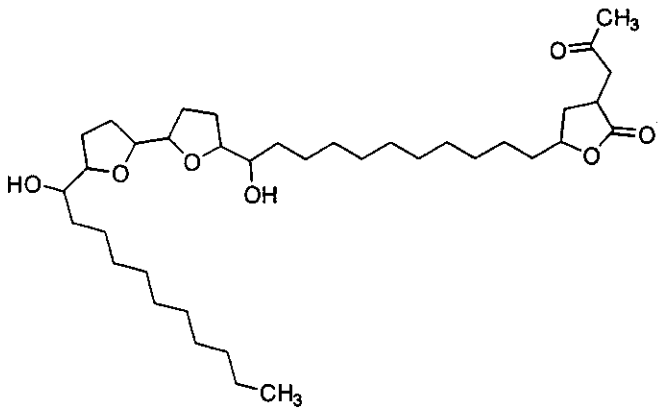


[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[一般的性質]Rollinone の光学異性体
[基原]*Asimina triloba*
[用途]細胞毒
[性状]ワックス
[比旋光度]:$[\alpha]_D^{22}$ +17.3 (c, 0.2 in $CHCl_3$)

----------文献----------

He, K. et al., Bioorg. Med. Chem., 1997, 5, 501-506, (分離, IR, H-NMR, C13-NMR, Mass)

§ **2,4-*cis*-Trilobacinone; 2-Epimer**
[化学名・別名]2,4-*trans*-Trilobacinone
[CAS No.]189686-32-6
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]

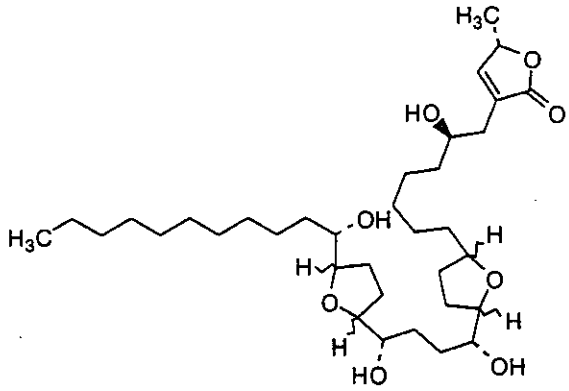


[分子式]$C_{37}H_{66}O_7$
[分子量]622.924
[基原]*Asimina triloba*
[用途]細胞毒
[性状]ワックス
[比旋光度]:$[\alpha]_D^{22}$ +9.2 (c, 0.2 in $CHCl_3$)

----------文献----------

He, K. et al., Bioorg. Med. Chem., 1997, 5, 501-506, (分離, IR, H-NMR, C13-NMR, Mass)

§ **Trilobalicin**
[CAS No.]189747-98-6
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]



[分子式]$C_{35}H_{62}O_8$
[分子量]610.87
[基原]*Asimina triloba*
[用途]細胞毒
[性状]ワックス
[比旋光度]:$[\alpha]_D^{22}$ +13.6 (c, 0.1 in $CHCl_3$)

----------文献----------

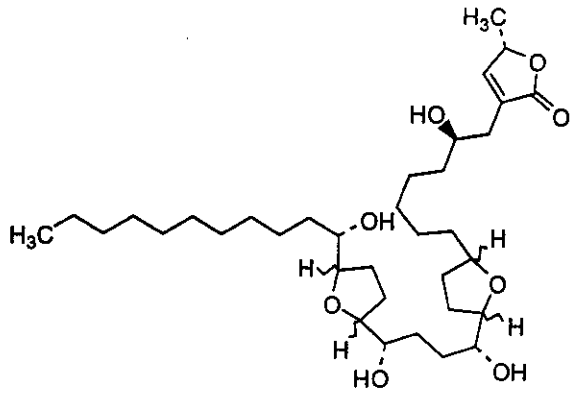
He, K. et al., Bioorg. Med. Chem., 1997, 5, 501-506, (分離, IR, H-NMR, C13-NMR, Mass)

***********ホホバ (Jojoba) ***********

§§ツゲ科ホホバ(*Simmondsia californica* Nuttall)の果実。

§ **11,12-Dihydroxyeicosanoic acid; (11*RS*,12*SR*)-form**
[化学名・別名](±)-*erythro*-form

§ **Trilobalicin**
[CAS No.]189747-98-6
[化合物分類]ポリケチド(Annonaceae acetogenins)
[構造式]



[分子式]$C_{35}H_{62}O_8$
[分子量]610.87
[基原]*Asimina triloba*
[用途]細胞毒
[性状]ワックス
[比旋光度]:$[\alpha]_D^{22}$ +13.6 (c, 0.1 in $CHCl_3$)

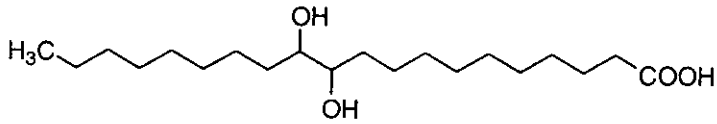
----------文 献----------

He, K. et al., Bioorg. Med. Chem., 1997, 5, 501-506, (分離, IR, H-NMR, C13-NMR, Mass)

**********ホホバ (Jojoba) **********

§§ツゲ科ホホバ(*Simmondsia californica* Nuttall)の果実。

§ **11,12-Dihydroxyeicosanoic acid; (11*RS*,12*SR*)-form**
[化学名・別名](±)-*erythro*-form
[CAS No.]125876-55-3
[化合物分類]脂肪族化合物(Saturated unbranched carboxylic acids and lactones)
[構造式]

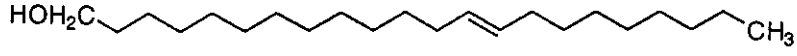


[分子式]$C_{20}H_{40}O_4$
[分子量]344.534
[基原]次の植物の種子油から分離: *Cardamine impatiens*, *Simmondsia californica*
[性状]結晶 (EtOAc)
[融点]Mp 130.5 ℃
[その他のデータ]Nat. prod. had no detectable opt. rotn. 非天然物

----------文 献----------

Mikolajczak, K.L. et al., J. Am. Oil Chem. Soc., 1965, 42, 939, (分離, 合成法)
Ewing, D.F. et al., Can. J. Chem., 1967, 45, 1259, (合成法, 分割, H-NMR)

§ **13-Docosen-1-ol; (Z)-form**
[化学名・別名]Erucyl alcohol
[CAS No.]629-98-1
[化合物分類]脂肪族化合物(Unbranched alkenic alcohols)
[構造式]
[分子式]$C_{22}H_{44}O$

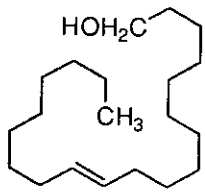


[分子量]324.589
[基原]次の植物から分離: *Simmondsia californica* (prob. the Z-form)の種子ワックス
[性状]結晶 (Me_2CO or MeOH)
[融点]Mp 34.5-35.5 ℃
[沸点]Bp_{10} 240.5-241.5 ℃. $Bp_{0.2}$ 199 ℃
[販売元]Sigma:E8636

----------文 献----------

Green, T.G. et al., J.C.S., 1936, 1750, (分離)
Kameoka, H. et al., Yukagaku, 1970, 19, 70

§ **11-Eicosen-1-ol; (Z)-form**
[CAS No.]62442-62-0
[化合物分類]脂肪族化合物(Unbranched alkenic alcohols)
[構造式]



[融点]Mp 95-100 ℃
[比旋光度]:[α]$_D^{25}$ -78 (c, 1 in MeOH)
[化学物質毒性データ総覧(RTECS)登録番号]AM0250000

----------文献----------

Elliger, C.A. et al., Phytochemistry, 1974, 13, 2319, (分離)
Van Boven, M. et al., J. Agric. Food Chem., 1993, 41, 1605; 1994, 42, 2684; 1996, 44, 2239-2243, (分離, 結晶構造, 誘導体)

***RTECS (化学物質毒性データ) ***
健康障害に関するデータ
その他の多回投与試験

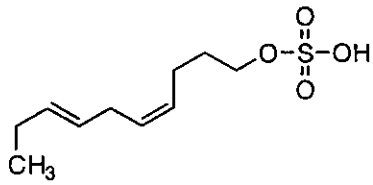
<<試験方法>> 最小毒性量(TDLo).
曝露経路　　: 経口投与.
被験動物　　: げっ歯類-ラット.
投与量・期間 : 1250 mg/kg/5 日間間欠投与
毒性影響　　: [栄養と総代謝] 体重減少または体重増加.

参照文献
Journal of Agricultural and Food Chemistry. (American Chemical Soc., Distribution Office Dept. 223, POB 57136, West End Stn., Washington, DC 20037) 3,1992

**********ホヤ (Sea squirt) **********

§ § ピウラ科ホヤ(*Halocynthia roretzi* Drasche)などその他近縁動物体。

§ 4,7-Decadien-1-ol; (4*Z*,7*E*)-form, *O*-Sulfate

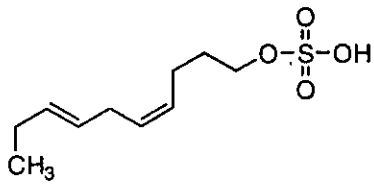


[CAS No.]160116-62-1
[化合物分類]脂肪族化合物(Unbranched alkenic alcohols)
[構造式]
[分子式]$C_{10}H_{18}O_4S$
[分子量]234.316
[基原]次の動物から分離: ホヤ類 *Halocynthia roretzi*
[用途]抗菌, 抗カビ剤

----------文献----------

Van Lier, F.P. et al., Perfum. Essent. Oil Res., 1985, 215; CA, 106, 72677f, (分離, 合成法)
Tsukamoto, S. et al., J. Nat. Prod., 1994, 57, 1606, (sulfates)

§ 4,7-Decadien-1-ol; (4*Z*,7*Z*)-form, *O*-Sulfate

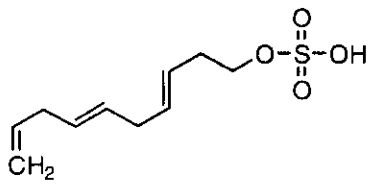


[CAS No.]160116-61-0
[化合物分類]脂肪族化合物(Unbranched alkenic alcohols)
[構造式]
[分子式]$C_{10}H_{18}O_4S$
[分子量]234.316
[基原]次の動物から分離: *Halocynthia roretzi*
[用途]抗菌, 抗カビ剤

----------文献----------

Van Lier, F.P. et al., Perfum. Essent. Oil Res., 1985, 215; CA, 106, 72677f, (分離, 合成法)
Tsukamoto, S. et al., J. Nat. Prod., 1994, 57, 1606, (sulfates)

§ 3,6,9-Decatrien-1-ol; (3*Z*,6*Z*)-form, *O*-Sulfate



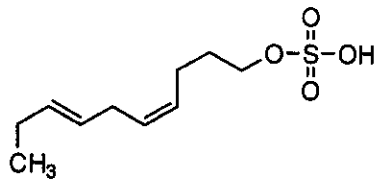
[CAS No.]160116-63-2
[化合物分類]脂肪族化合物(Unbranched alkenic alcohols)
[構造式]
[分子式]$C_{10}H_{16}O_4S$
[分子量]232.3
[基原]次の動物から分離: ホヤ類 *Halocynthia roretzi*
[用途]抗菌, 抗カビ剤

----------文献----------

Tsukamoto, S. et al., J. Nat. Prod., 1994, 57, 1606, (sulfate)

Tsukamoto, S. et al., J. Nat. Prod., 1994, 57, 1606, (sulfates)

§ 4,7-Decadien-1-ol; (4*Z*,7*Z*)-form, *O*-Sulfate

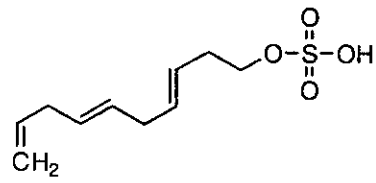


[CAS No.] 160116-61-0
[化合物分類] 脂肪族化合物(Unbranched alkenic alcohols)
[構造式]
[分子式] $C_{10}H_{18}O_4S$
[分子量] 234.316
[基原] 次の動物から分離: *Halocynthia roretzi*
[用途] 抗菌, 抗カビ剤

----------文 献----------

Van Lier, F.P. et al., Perfum. Essent. Oil Res., 1985, 215; CA, 106, 72677f, (分離, 合成法)
Tsukamoto, S. et al., J. Nat. Prod., 1994, 57, 1606, (sulfates)

§ 3,6,9-Decatrien-1-ol; (3*Z*,6*Z*)-form, *O*-Sulfate



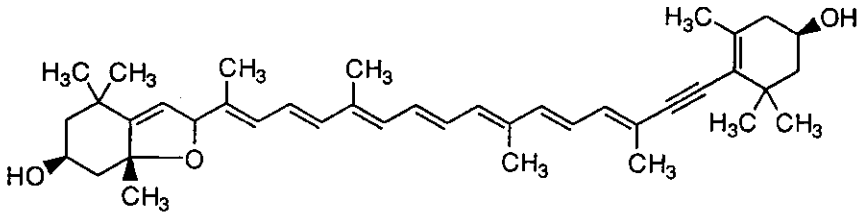
[CAS No.] 160116-63-2
[化合物分類] 脂肪族化合物(Unbranched alkenic alcohols)
[構造式]
[分子式] $C_{10}H_{16}O_4S$
[分子量] 232.3
[基原] 次の動物から分離: ホヤ類 *Halocynthia roretzi*
[用途] 抗菌, 抗カビ剤

----------文 献----------

Tsukamoto, S. et al., J. Nat. Prod., 1994, 57, 1606, (sulfate)

§ Diadinochrome

[化学名・別名] 7',8'-Didehydro-5,8-epoxy-β,β-carotene-3,3'-diol
[CAS No.] 24381-84-8
[化合物分類] テルペノイド(Tetraterpenoids)
[構造式]

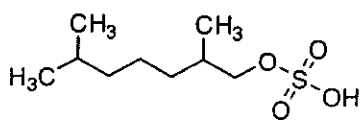


[分子式] $C_{40}H_{54}O_3$
[分子量] 582.865
[基原] *Pelagrococcus subviridis*, *Phaeodactylum tricornutum*, *Lamprometra klunzingeri*, the sea squirt *Halocynthia roretzi*
[性状] 橙色の板状結晶(petrol)
[融点] Mp 127-130 ℃

----------文 献----------

Gross, J. et al., Comp. Biochem. Physiol., B: Comp. Biochem., 1975, 52, 459, (分離)
Carreto, J.L. et al., Mar. Biol. (Berlin), 1976, 36, 105, (分離)
Matsuno, T. et al., Chem. Pharm. Bull., 1984, 32, 4309, (生育)
Bjørnland, T. et al., Phytochemistry, 1989, 28, 3347, (分離, H-NMR)

§ 2,6-Dimethyl-1-heptanol; (±)-form, *O*-Sulfate

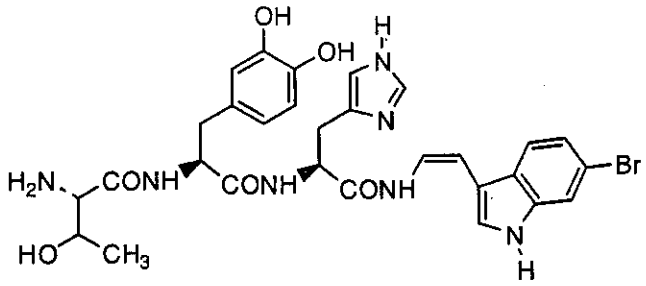


[CAS No.] 160116-60-9
[化合物分類] テルペノイド(Acyclic monoterpenoids), 脂肪族化合物(Branched aliphatic alcohols)
[構造式]
[分子式] $C_9H_{20}O_4S$
[分子量] 224.321
[基原] 次の動物から分離: ホヤ類 *Halocynthia roretzi*
[用途] 抗菌, 抗カビ剤

----------文 献----------

Crispino, A. et al., J. Nat. Prod., 1994, 57, 1575-1577, (分離, H-NMR, C13-NMR)
Tsukamoto, S. et al., J. Nat. Prod., 1994, 57, 1606, (sulfate)
De Rosa, S. et al., J. Nat. Prod., 1997, 60, 462-463, (絶対構造)

[構造式]
[分子式] $C_{29}H_{32}BrN_7O_6$
[分子量] 654.519
[一般的性質] オリゴペプタイド系抗生物質
[基原] 次の動物から分離: the haemocytes of ホヤ類 *Halocynthia roretzi*
[用途] 数種の細菌と酵母に抗活性を有する
[比旋光度]: $[\alpha]_D^{25}$ +63.1 (c, 0.5 in MeOH)
[溶解性] BERDY SOL: メタノール, アセトン に可溶

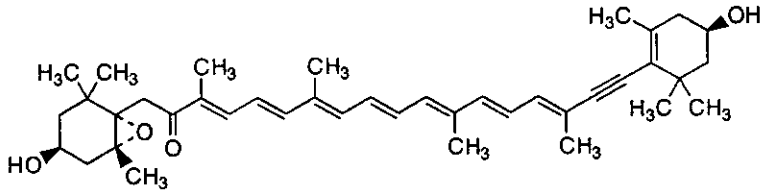


UV: [neutral] λ_{max} 203 (E1%/1cm 785); 232 (E1%/1cm 428); 282 (E1%/1cm 276) (MeOH) (Berdy)

----------文献----------

Azumi, K. et al., Biochemistry, 1990, 29, 159, (分離)

§ Halocynthiaxanthin
[化学名・別名] 7',8'-Didehydro-5,6-epoxy-3,3'-dihydroxy-5,6,7,8-tetrahydro-β,β-caroten-8-one
[CAS No.] 81306-52-7
[化合物分類] テルペノイド (Tetraterpenoids)
[構造式]

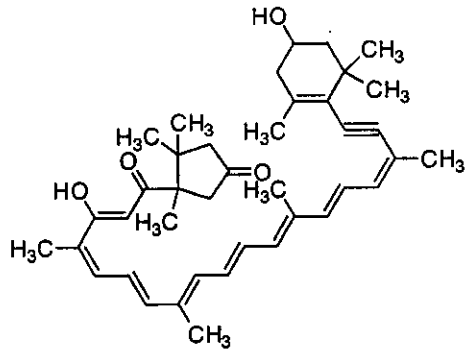


[分子式] $C_{40}H_{54}O_4$
[分子量] 598.864
[基原] *Halocynthia roretzi*
[用途] Inhibitor of Reverse Tran scriptases of HIV-1 and HIV-2
[性状] 赤色がかった針状結晶 (petrol)
[融点] Mp 158-160 ℃
[溶解性] BERDY SOL: メタノール, エーテルに可溶; 水に難溶
UV: [neutral] λ_{max} 430 (sh) (ε); 452 (ε); 470 (ε) (溶媒の報告はない) (Derep) [neutral] λ_{max} 430 ; 452 ; 470 (Et_2O) (Berdy)

----------文献----------

Matsuno, T. et al., Chem. Pharm. Bull., 1984, 32, 4309
Loya, S. et al., Arch. Biochem. Biophys., 1992, 293, 208
Yamano, Y. et al., J.C.S. Perkin 1, 1995, 1895, (合成法)

§ Mytiloxanthin; 3'-Ketone
[化学名・別名] Mytiloxanthinone. 7,8-Didehydro-3,8'-dihydroxy-β,κ-carotene-3',6'-dione
[CAS No.] 83746-66-1
[化合物分類] テルペノイド (Tetraterpenoids)
[構造式]



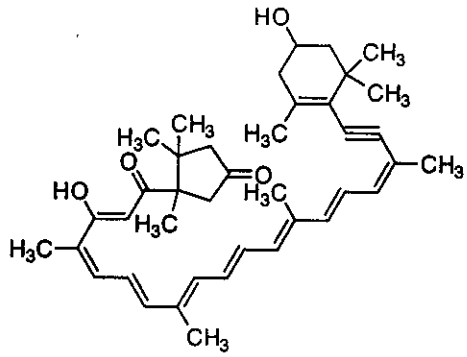
[分子式] $C_{40}H_{52}O_4$
[分子量] 596.848
[基原] sea squirt *Halocynthia roretzi*
[性状] 赤色がかった針状結晶
[融点] Mp 226-228 ℃

----------文献----------

Khare, A. et al., Tet. Lett., 1973, 3921-3924, (分離)
Bernhard, K. et al., Helv. Chim. Acta, 1982, 65, 2224-2229, (4-Oxomytiloxanthin)
Matsuno, T. et al., Chem. Pharm. Bull., 1984, 32, 4309-4315, (分離, UV, Mass, H-NMR)

§ Palythenic acid; (*E*)-form
[CAS No.] 83509-36-8
[その他の CAS No.] 131320-70-2
[化合物分類] アミノ酸とペプチド (Miscellaneous modified aminoacids), アルカロイド化合物 (Nitrogenous marine toxins)

§ Mytiloxanthin; 3'-Ketone



[化学名・別名] Mytiloxanthinone.
7,8-Didehydro-3,8'-dihydroxy-β,κ-carotene-3',6'-dione
[CAS No.] 83746-66-1
[化合物分類] テルペノイド (Tetraterpenoids)
[構造式]

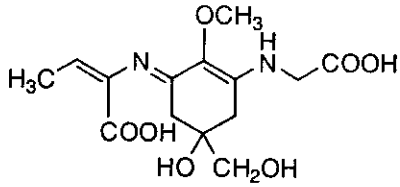
[分子式] $C_{40}H_{52}O_4$
[分子量] 596.848
[基原] sea squirt *Halocynthia roretzi*
[性状] 赤色がかった針状結晶
[融点] Mp 226-228 ℃

----------文 献----------

Khare, A. et al., Tet. Lett., 1973, 3921-3924, (分離)
Bernhard, K. et al., Helv. Chim. Acta, 1982, 65, 2224-2229, (4-Oxomytiloxanthin)
Matsuno, T. et al., Chem. Pharm. Bull., 1984, 32, 4309-4315, (分離, UV, Mass, H-NMR)

§ Palythenic acid; (*E*)-form

[CAS No.] 83509-36-8
[その他の CAS No.] 131320-70-2
[化合物分類] アミノ酸とペプチド (Miscellaneous modified aminoacids), アルカロイド化合物 (Nitrogenous marine toxins)
[構造式]



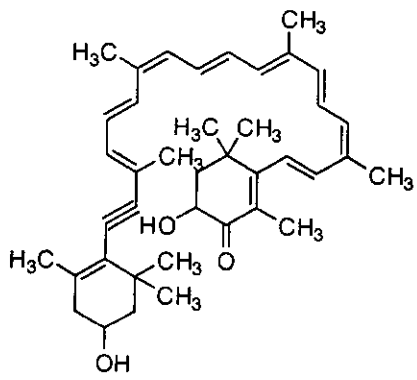
[分子式] $C_{14}H_{20}N_2O_7$
[分子量] 328.321
[基原] 次の動物から分離: ホヤ類 *Halocynthia roretzi*, *Alexandrium excavatum*, *Noctiluca* sp.
[性状] 無定型の粉末 (as Na salt)
[融点] Mp 153-156 ℃で分解 (as Na salt)
[比旋光度]: $[\alpha]_D^{25}$ -50 (c, 0.3 in H_2O)

----------文 献----------

Hirata, Y. et al., Pure Appl. Chem., 1979, 51, 1875, (分離, UV, C13-NMR, 構造決定, 誘導体)
Kobayashi, J. et al., Tet. Lett., 1981, 22, 3001-3002, (分離, UV, H-NMR, C13-NMR)
Japan. Pat., 1982, 82 62 243; CA, 97, 196864e, (分離)
Carreto, J.I. et al., J. Plankton Res., 1990, 12, 909-921, (分離, UV)
Bandaranayake, W.M., Nat. Prod. Rep., 1998, 16, 159-172, (レビュー)

§ Pectenol; 4-Ketone

[化学名・別名] 7',8'-Didehydro-3,3'-dihydroxy-β,β-caroten-4-one. Pectenolone
[CAS No.] 16913-24-9
[化合物分類] テルペノイド (Tetraterpenoids)
[構造式]



[分子式] $C_{40}H_{52}O_3$
[分子量] 580.849
[基原] ホタテ貝 (*Pecten maximus*) and the tunicates *Halocynthia papillosa*, *Halocynthia roretzi*
[性状] 赤色がかった針状結晶 (petrol)
[融点] Mp 162-163 ℃

----------文 献----------

Campbell, S.A. et al., Chem. Comm., 1967, 941, (Pectenolone)
Hiraoka, K. et al., Nippon Suisan Gakkaishi, 1982, 48, 215; CA, 97, 56060g, (絶対構造, Pectenolone)

示す; BERDY HAZD : 50 %致死量(LD_{50})(ラット, 経口) 200 mg/kg
[化学物質毒性データ総覧(RTECS)登録番号]OT0175000
[販売元]Rare Chemicals Library:S56032-4

----------文献----------

Beckett, A.H. et al., J. Pharm. Pharmacol., 1955, 7, 55, (purifn)
Bernhard, R.A. et al., Phytochemistry, 1971, 10, 177, (分離)

***RTECS (化学物質毒性データ) ***

生体影響物質　　: 農業化学品. 催腫瘍物質. 医薬品. 一時刺激物質.

健康障害に関するデータ

皮膚/眼の刺激に関するデータ

<<試験方法>> 標準ドライズ(Draize)試験法.
曝露経路　　: 皮膚への塗布
被験動物　　: げっ歯類-ウサギ.
投与量・期間 : 500 mg
反応の症度　: 中等度.

参照文献
Shell Chemical Company. Unpublished Report.(2401 Crow Canyon Rd., San Romon, CA 94583)1,1961

急性毒性に関するデータ

<<試験方法>> 認知されている最低致死量に関する試験
曝露経路　　: 経口投与.
被験動物　　: ほ乳類-イヌ.
投与量・期間 : 250 mg/kg
毒性影響　　: 致死量以外に毒性影響に関する報告はない.

参照文献
Journal of Pharmacology and Experimental Therapeutics.(Williams & Wilkins Co., 428 E. Preston St., Baltimore, MD 21202) 24,359,1925

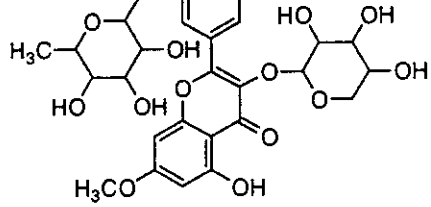
催腫瘍性に関するデータ

<<試験方法>> 最小毒性量(TDLo).
曝露経路　　: 皮膚への塗布
被験動物　　: げっ歯類-マウス.
投与量・期間 : 25 gm/kg/42 週間間欠投与
毒性影響　　: 〔催腫瘍性〕RTECS 基準による催腫瘍性.
〔皮膚と付属器官〕腫瘍.
〔催腫瘍性〕適用部位の腫瘍.

参照文献
Journal of the National Cancer Institute.(Washington, DC) 35,707,1965

§ 3,3',4',5-Tetrahydroxy-7-methoxyflavone; 3'-*O*-α-L-Rhamnopyranoside, 3-*O*-arabinoside

[化学名・別名]Peumoside
[化合物分類]フラボノイド(Flavonols; 5 × O-置換基)
[構造式]



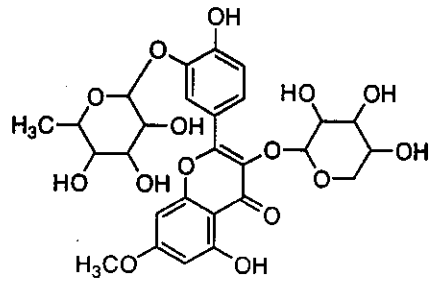
[分子式]$C_{27}H_{30}O_{15}$
[分子量]594.525
[基原]次の植物から分離: *Peumus boldus*
[性状]針状結晶 (EtOAc/MeOH)
[融点]Mp 195-197 ℃

----------文献----------

Krug, H. et al., Pharmazie, 1965, 20, 692, (Peumoside)
The Flavonoids: Advances in Research since 1980, (Ed. Harborne, J.B.), Chapman and Hall, London, 1988

Journal of the National Cancer Institute.(Washington, DC) 35,707,1965

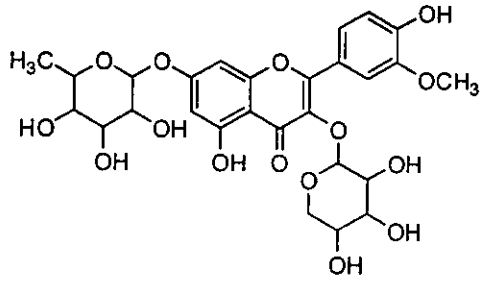
§ 3,3',4',5-Tetrahydroxy-7-methoxyflavone; 3'-*O*-α-L-Rhamnopyranoside, 3-*O*-arabinoside
[化学名・別名]Peumoside
[化合物分類]フラボノイド(Flavonols; 5 × O-置換基)
[構造式]



[分子式]$C_{27}H_{30}O_{15}$
[分子量]594.525
[基原]次の植物から分離: *Peumus boldus*
[性状]針状結晶 (EtOAc/MeOH)
[融点]Mp 195-197 ℃

----------文 献----------
Krug, H. et al., Pharmazie, 1965, 20, 692, (Peumoside)
The Flavonoids: Advances in Research since 1980, (Ed. Harborne, J.B.), Chapman and Hall, London, 1988

§ 3,4',5,7-Tetrahydroxy-3'-methoxyflavone; 3-*O*-α-L-Arabinopyranoside, 7-*O*-α-L-rhamnopyranoside
[CAS No.]69760-70-9
[化合物分類]フラボノイド(Flavonols; 5 × O-置換基)
[構造式]



[分子式]$C_{27}H_{30}O_{15}$
[分子量]594.525
[基原]次の植物から分離: *Cheiranthus cheiri*, *Peumus boldus*, *Erysimum perofskianum*
[性状]結晶 (MeOH)
[融点]Mp 211 ℃

§ 3,4',5,7-Tetrahydroxy-3'-methoxyflavone; 3-*O*-[α-L-Rhamnopyranosyl-(1 → ?)-α-L-rhamnopyranoside]
[化学名・別名]Isorhamnetin 3-dirhamnoside
[化合物分類]フラボノイド(Flavonols; 5 × O-置換基), フラボノイド(Flavonoids 構造は一部又は全てが未知)
[構造式]有効な構造式はない
[分子式]$C_{28}H_{32}O_{15}$
[分子量]608.552
[基原]*Peumus boldus* の葉に存在する配等体
[融点]Mp 230-233 ℃
[その他のデータ]暫定的な構造

----------文 献----------
Heap, T., J.C.S., 1926, 2336-2344, (Isorhamnetin, 合成法)
Kuhn, R., Chem. Ber., 1948, 81, 363-367, (Isorhamnetin, 分離)

***********ボロニア (Boronia) ***********

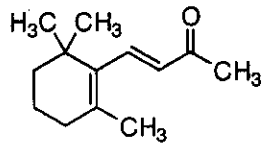
§§ミカン科ボロニア(*Boronia megastigma* Nees)の花, 全草。

§ 4-(2-Aminoethyl)phenol; *O*-(3-Methyl-2-butenyl), *N*-tigloyl
[化学名・別名]*N*-[2-(4-Prenyloxyphenyl)ethyl]tiglamide
[CAS No.]172837-74-0
[化合物分類]アルカロイド化合物(Miscellaneous simple amide alkaloids), アルカロイド化合物(Simple

Takeya, K. et al., Chem. Pharm. Bull., 1982, 30, 1496, (分離, Me ester)
Murakami, T. et al., Prog. Chem. Org. Nat. Prod., 1988, 54, 1, (2-*O*-methylglucoside)
Delle Monache, F. et al., Gazz. Chim. Ital., 1989, 119, 435-439, (Methyl 4-prenyloxycinnamate)

§ 5,7-Megastigmadien-9-one

[化学名・別名]4-(2,6,6-Trimethyl-1-cyclohexen-1-yl)-3-buten-2-one(CAS 名). β-Ionone. Boronione. FEMA no. 2595



[CAS No.]14901-07-6
[関連 CAS No.]79-77-6, 8013-90-9
[化合物分類]テルペノイド(Megastigmane norterpenoids)
[構造式]
[分子式]$C_{13}H_{20}O$
[分子量]192.3
[基原]次の植物のオイルを含む多くの精油: *Boronia megastigma*
[用途]Constit. of coml. Ionone. 香水原料, 香料
[性状]オイル
[沸点]Bp_{24} 150-151 ℃
[傷害・毒性]発火温度:112 ℃. 50 %致死量(LD_{50})(ラット, 経口) 4590 mg/kg
[化学物質毒性データ総覧(RTECS)登録番号]EN0350000
[販売元]Aldrich:I-1260-3

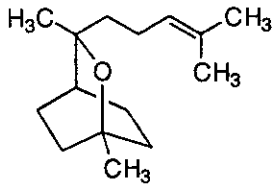
----------文献----------

Shervi, V.B. et al., Some Recent Dev. Chem. Nat. Prod., (Rangoswami, S. etal, Ed.), Prentice-Hall, India, 1972, 1, (レビュー)
Fenaroli's Handbook of Flavor Ingredients, 3rd edn., (ed. Burdock, G.A.), CRC Press, 1995, 2, 372; 373, (レビュー)

***RTECS (化学物質毒性データ) ***
健康障害に関するデータ
急性毒性に関するデータ

<<試験方法>> LD50 試験(50%致死量試験).
曝露経路　：経口投与.
被験動物　：げっ歯類-ラット.
投与量・期間：4590 mg/kg
毒性影響　：〔行動〕傾眠(全身活動度の低下).
〔行動〕振戦.

参照文献
Food and Cosmetics Toxicology.(London, UK) 2,327,1964



§ Sesquicineol

[化学名・別名]3,7-Epoxy-10-bisabolene. 3,7-Oxido-10-bisabolene
[CAS No.]90131-02-5
[化合物分類]テルペノイド(Bisabolane sesquiterpenoids)
[構造式]
[分子式]$C_{15}H_{26}O$
[分子量]222.37
[基原]*Senecio subrubriflorus*, *Anthemis alpestris*, *Aydendron barbeyana*, *Boronia megastigma*
[用途]香水物質
[性状]オイル
[沸点]Bp_5 90-94 ℃. $Bp_{0.1}$ 120 ℃
[比旋光度]:$[\alpha]_D^{24}$ -8.4 (c, 4.06 in $CHCl_3$)

----------文献----------

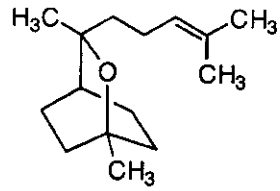
Bohlmann, F. et al., Phytochemistry, 1982, 21, 1697, (分離)
Weyerstahl, P. et al., Annalen, 1993, 111, (Dehydrosesquicineol)

*********マイタケ (Maitake) *********

〔行動〕振戦.

参照文献

Food and Cosmetics Toxicology.(London, UK) 2,327,1964



§ Sesquicineol

[化学名・別名]3,7-Epoxy-10-bisabolene. 3,7-Oxido-10-bisabolene

[CAS No.]90131-02-5

[化合物分類]テルペノイド(Bisabolane sesquiterpenoids)

[構造式]

[分子式]$C_{15}H_{24}O$

[分子量]222.37

[基原]*Senecio subrubriflorus*, *Anthemis alpestris*, *Aydendron barbeyana*, *Boronia megastigma*

[用途]香水物質

[性状]オイル

[沸点]Bp_5 90-94 ℃. $Bp_{0.1}$ 120 ℃

[比旋光度]:$[\alpha]_D^{24}$ -8.4 (c, 4.06 in $CHCl_3$)

----------文 献----------

Bohlmann, F. et al., Phytochemistry, 1982, 21, 1697, (分離)

Weyerstahl, P. et al., Annalen, 1993, 111, (Dehydrosesquicineol)

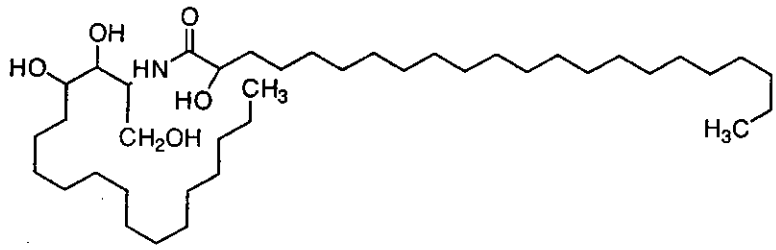
**********マイタケ (Maitake) **********

§§サルノコシカケ科マイタケ(*Grifola frondosa* (Fr.) S. F. Gray)の子実体。

§ 2-Amino-1,3,4-octadecanetriol; (2*S*,3*S*,4*R*)-form, *N*-(2*R*-Hydroxydocosanoyl)

[化合物分類]脂肪族化合物(Sphingolipids)

[構造式]



[分子式]$C_{40}H_{81}NO_5$

[分子量]656.084

[基原]次の植物から分離: キノコ *Grifola frondosa*

[性状]無定型の粉末

[比旋光度]:$[\alpha]_D^{22}$ +12.9 (c, 0.1 in Py)

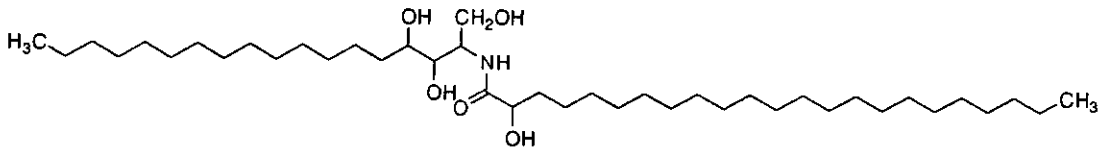
----------文 献----------

Bala, S.R.G. et al., Chem. Pharm. Bull., 1999, 47, 1214-1220, (*N*-2-hydroxyoctadecanoyl)

§ 2-Amino-1,3,4-octadecanetriol; (2*S*,3*S*,4*R*)-form, *N*-(2*R*-Hydroxytricosanoyl)

[化合物分類]脂肪族化合物(Sphingolipids)

[構造式]



[分子式]$C_{41}H_{83}NO_5$

[分子量]670.11

[基原]次の植物から分離: キノコ *Grifola frondosa*

[性状]無定型の粉末

[比旋光度]:$[\alpha]_D^{20}$ +14.9 (c, 0.07 in Py)

----------文 献----------

Bala, S.R.G. et al., Chem. Pharm. Bull., 1999, 47, 1214-1220, (*N*-2-hydroxyoctadecanoyl)

§ 2-Amino-1,3,4-octadecanetriol; (2*S*,3*S*,4*R*)-form, *N*-(2*R*-Hydroxypentacosanoyl)

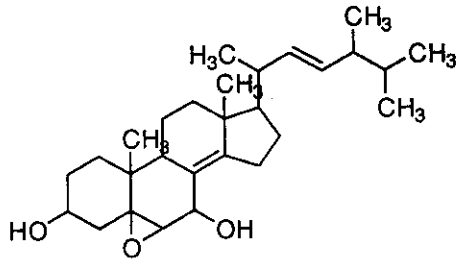
----------文献----------

Bala, S.R.G. et al., Chem. Pharm. Bull., 1999, 47, 1214-1220, (*N*-2-hydroxyoctadecanoyl)

§ 5,6-Epoxyergosta-8(14),22-diene-3,7-diol; (3 β,5 α,6 α,7 β,22*E*,24*R*)-form

[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).

[構造式]



[分子式]$C_{28}H_{44}O_3$

[分子量]428.654

[基原]*Grifola frondosa*

[性状]無定型の粉末

[比旋光度]:$[\alpha]_D^{18}$ -52.4 (c, 0.2 in $CHCl_3$)

----------文献----------

Della Greca, M. et al., Nat. Prod. Lett., 1993, 2, 27, (分離, H-NMR, C13-NMR)

Migliuolo, A. et al., Steroids, 1993, 58, 134, (分離, H-NMR, C13-NMR)

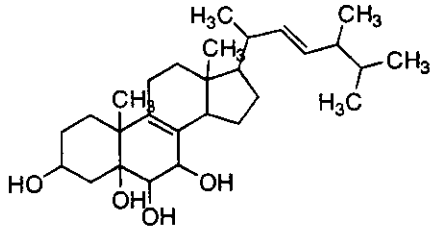
Ishizuka, T., Chem. Pharm. Bull., 1997, 45, 1756-1760, (分離, H-NMR, C13-NMR)

§ Ergosta-8,22-diene-3,5,6,7-tetrol; (3 β,5 α,6 β,7 α,22*E*,24*R*)-form

[CAS No.]200942-15-0

[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).

[構造式]



[分子式]$C_{28}H_{46}O_4$

[分子量]446.669

[基原]*Grifola frondosa*

[性状]無定型の粉末

[比旋光度]:$[\alpha]_D^{20}$ +50 (c, 0.1 in $CHCl_3$)

----------文献----------

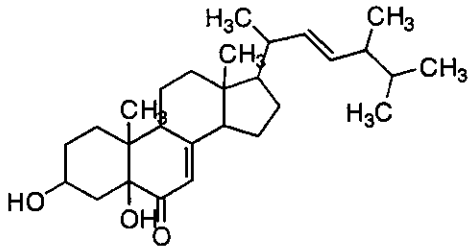
Ishizuka, T. et al., Chem. Pharm. Bull., 1997, 45, 1756-1760, (分離, H-NMR, C13-NMR)

§ Ergosta-7,22-diene-3,5,6-triol; (3 β,5 α,6 β,22*E*,24*R*)-form, 6-Ketone

[化学名・別名]3,5-Dihydroxyergosta-7,22-dien-6-one. 3,5-Dihydroxy-24-methylcholesta-7,22-dien-6-one

[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).

[構造式]



[分子式]$C_{28}H_{44}O_3$

[分子量]428.654

[基原]*Grifola frondosa*

[性状]Amorph. solid

[比旋光度]:$[\alpha]_D^{25}$ +9.1 (c, 0.1 in $CHCl_3$)

UV: [neutral] λ_{max} 248 (log ε 3.9) (MeOH)

----------文献----------

Serebryakov, E.P. et al., Tetrahedron, 1970, 26, 5215, (分離)

Cafieri, F. et al., J. Nat. Prod., 1985, 48, 944, (分離)

Kawagishi, H. et al., Phytochemistry, 1988, 27, 2777, (分離)

Aiello, A. et al., Steroids, 1991, 56, 337, (分離, H-NMR, ketone)

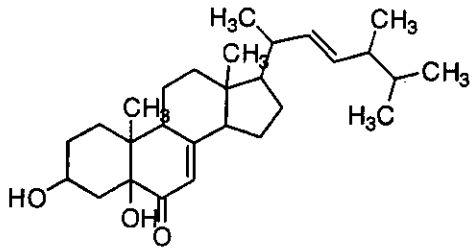
Anjaneyulu, A.S.R. et al., J.C.S. Perkin 1, 1997, 959, (分離, H-NMR)

§ Ergosta-7,9(11),22-triene-3,5,6-triol; (3 β,5 α,6 α,22*E*,24*R*)-form

[CAS No.]71097-07-9

[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).

§ Ergosta-7,22-diene-3,5,6-triol; (3 β,5 α,6 β,22*E*,24*R*)-form, 6-Ketone
[化学名・別名]3,5-Dihydroxyergosta-7,22-dien-6-one. 3,5-Dihydroxy-24-methylcholesta-7,22-dien-6-one
[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).
[構造式]

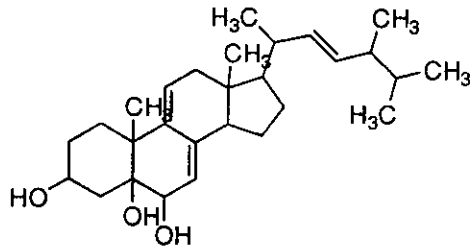


[分子式]$C_{28}H_{44}O_3$
[分子量]428.654
[基原]*Grifola frondosa*
[性状]Amorph. solid
[比旋光度]:$[\alpha]_D^{25}$ +9.1 (c, 0.1 in $CHCl_3$)
UV: [neutral] λ_{max} 248 (log ε 3.9) (MeOH)

----------文 献----------

Serebryakov, E.P. et al., Tetrahedron, 1970, 26, 5215, (分離)
Cafieri, F. et al., J. Nat. Prod., 1985, 48, 944, (分離)
Kawagishi, H. et al., Phytochemistry, 1988, 27, 2777, (分離)
Aiello, A. et al., Steroids, 1991, 56, 337, (分離, H-NMR, ketone)
Anjaneyulu, A.S.R. et al., J.C.S. Perkin 1, 1997, 959, (分離, H-NMR)

§ Ergosta-7,9(11),22-triene-3,5,6-triol; (3 β,5 α,6 α,22*E*,24*R*)-form
[CAS No.]71097-07-9
[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).
[構造式]

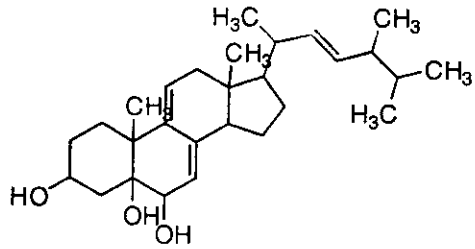


[分子式]$C_{28}H_{44}O_3$
[分子量]428.654
[基原]*Grifola frondosa*

----------文 献----------

Chen, R. et al., Acta Bot. Sin. (Engl. Transl.), 1991, 33, 65-68, (分離, H-NMR, C13-NMR)
Ishizuka, T. et al., Chem. Pharm. Bull., 1997, 45, 1756-1760, (分離, H-NMR, C13-NMR)

§ Ergosta-7,9(11),22-triene-3,5,6-triol; (3 β,5 α,6 β,22*E*,24*R*)-form
[CAS No.]200942-16-1
[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).
[構造式]



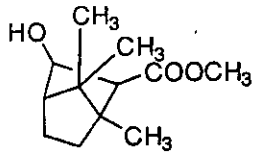
[分子式]$C_{28}H_{44}O_3$
[分子量]428.654
[基原]*Grifola frondosa*
[性状]無定型の粉末
[比旋光度]:$[\alpha]_D^{20}$ -3.7 (c, 0.3 in $CHCl_3$)
UV: [neutral] λ_{max} 244 (log ε 4) (MeOH)

----------文 献----------

Chen, R. et al., Acta Bot. Sin. (Engl. Transl.), 1991, 33, 65-68, (分離, H-NMR, C13-NMR)
Ishizuka, T. et al., Chem. Pharm. Bull., 1997, 45, 1756-1760, (分離, H-NMR, C13-NMR)

§ 3-Hydroxyergosta-5,8,22-trien-7-one; (3 β,22*E*,24*R*)-form
[CAS No.]200942-18-3
[化合物分類]ステロイド(Ergostane steroids;excluding withanolides and brassinolides). (C28).
[構造式]

§ 2,3-Bornanediol; (1*R*,2*R*,3*R*)-form, 2-Ac

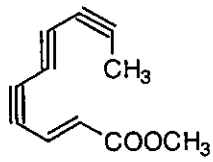


[化学名・別名]Vulgarole ‡
[CAS No.]61586-52-5
[化合物分類]テルペノイド(Camphane monoterpenoids)
[構造式]
[分子式]$C_{12}H_{20}O_3$
[分子量]212.288
[基原]*Artemisia vulgaris* のオイル
[性状]濃いオイル
[その他のデータ]Rel. config. only detd., could be the enantiomer

----------文献----------

Nano, G.M. et al., Planta Med., 1976, 30, 211-215, (Vulgarole)

§ 2-Decene-4,6,8-triynoic acid; (*Z*)-form, Me ester

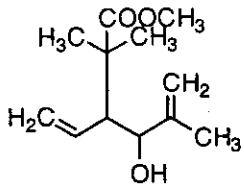


[CAS No.]2739-57-3
[化合物分類]脂肪族化合物(Acetylenic acids and esters)
[構造式]
[基原]*Artemisia vulgaris*, その他多くのキク科
[性状]淡黄色の針状結晶 (petrol)
[融点]Mp 114-115 ℃ (112 ℃)

----------文献----------

Stauholt, K. et al., Acta Chem. Scand., 1950, 4, 1567, (分離)
Sorensen, J.S. et al., Acta Chem. Scand., 1954, 8, 26, (分離)
Bell, I. et al., J.C.S., 1958, 1313, (合成法, Me ester)
Gardner, J.N. et al., J.C.S., 1960, 691, (分離)
Bohlmann, F. et al., Chem. Ber., 1962, 95, 1742; 1973, 106, 1328, (分離, 構造決定, 合成法)
Hodge, P. et al., J.C.S.(C), 1966, 1216, (成書)
Karrer, W. et al., Konstitution und Vorkommen der Organischen Pflanzenstoffe, 2nd edn., Birkhäuser Verlag, Basel, 1972, no. 770
Greger, H., Phytochemistry, 1978, 17, 86; 1982, 21, 1071, (分離, 構造決定)
Bohlmann, F. et al., Phytochemistry, 1979, 18, 1736; 1980, 19, 841; 2655, (分離)
Japan. Pat., 1991, 03 287532; CA, 116, 181120w, (分離)

§ 2,5-Dimethyl-3-vinyl-5-hexene-2,4-diol; 2-Ac

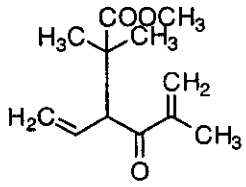


[CAS No.]79507-90-7
[化合物分類]テルペノイド(Irregular acyclic monoterpenoids)
[構造式]
[分子式]$C_{12}H_{20}O_3$
[分子量]212.288
[基原]*Artemisia vulgaris*
[その他のデータ]Mixt. of diastereoisomers

----------文献----------

Näf-Müller, R. et al., Helv. Chim. Acta, 1981, 64, 1424-1430, (分離, H-NMR)

§ 2,5-Dimethyl-3-vinyl-5-hexene-2,4-diol; 4-Ketone, 2-Ac



[CAS No.]79507-89-4
[化合物分類]テルペノイド(Irregular acyclic monoterpenoids)
[構造式]
[分子式]$C_{12}H_{18}O_3$
[分子量]210.272
[基原]*Artemisia vulgaris*

----------文献----------

Näf-Müller, R. et al., Helv. Chim. Acta, 1981, 64, 1424-1430, (分離, H-NMR)