

IMA Commission on New Minerals, Nomenclature and Classification (CNMNC)

NEWSLETTER 7

New minerals and nomenclature modifications approved in 2010

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The information given here is provided by the IMA Commission on New Minerals, Nomenclature and Classification for comparative purposes and as a service to mineralogists working on new species.

Each mineral is described in the following format:

NEW MINERAL PROPOSALS APPROVED IN NOVEMBER 2010

Mineral name, if the authors agree on its release prior to the full description appearing in press

IMA No. 2010-044

Titanium

Ti

Orebody 31, Luobusa mining district, in Qusong County, Tibet (29°5'N 92°5'E)

Fang Qing-Song, Shi Ni-Cheng, Li Guo-Wu*, Bai Wen-Ji, Yang Jing-Sui, Xiong Ming, Rong He and Ma Zhe-Sheng

*E-mail: liguwu@126.com

Known structure type

Hexagonal: $P6_3/mmc$

$a = 2.950(2)$, $c = 4.686(1)$ Å
2.569(32), 2.254(100), 1.730(16), 1.478(21), 0.989(5), 0.9464(8), 0.9172(4), 0.8214(4)

Type material is deposited in the collections of the Institute of Geology, Chinese Academy of Geological Sciences, Beijing, P.R. Republic of China catalogue number 74-3

How to cite: Fang, Q.-S., Shi, N.-C., Li, G.-W., Bai, W.-J., Yang, J.-S., Xiong, M., Rong, H. and Ma, Z.-S. (2011) Titanium, IMA 2010-044. CNMNC Newsletter No. 7, February 2011; *Mineralogical Magazine*, **75**, 27–31

Chemical formula

Type locality

Full authorship of proposal

E-mail address of corresponding author

Relationship to other minerals

Crystal system, Space group; Structure determined, yes or no

Unit-cell parameters

Strongest lines in the X-ray powder-diffraction pattern

Type specimen repository and specimen number

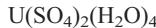
Citation details for the mineral prior to publication of full description

It is still a requirement for the authors to publish a full description of the new mineral.

NO OTHER INFORMATION WILL BE RELEASED BY THE COMMISSION

IMA No. 2010-046

Běhounekite



Geschieber vein, Jáchymov, Czech Republic
 Jakub Plášil*, Karla Fejfarová, Milan Novák, Michal Dušek, Jiří Sejkora, Radek Škoda, Jan Hloušek and Juraj Majzlan
 *E-mail: jakub_plasil@nm.cz

Known structure type

Orthorhombic: *Pnma*; structure determined
 $a = 14.6464(3)$, $b = 11.0786(3)$, $c = 5.6910(1)$ Å
 7.330(100), 6.112(54), 5.538(21), 4.787(42), 3.663(17), 3.478(20), 3.080(41), 2.495(17)
 Type material is deposited in the collections of the Department of Mineralogy and Petrology of the National Museum in Prague, catalogue number P1P 2/2010

How to cite: Plášil, J., Fejfarová, K., Novák, M., Dušek, M., Sejkora, J., Škoda, R., Hloušek, J. and Majzlan, J. (2011) Běhounekite, IMA 2010-046. CNMNC Newsletter No. 7, February 2011, page 28; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-047

Carlosbarbosaite



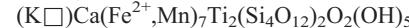
Jaguaracu pegmatite, Jaguaracu municipality, Minas Gerais, Brazil (19°38'57"S 42°44'59"W)
 Daniel Atencio*, Andrew C. Roberts, Mark A. Cooper, Luiz A.D. Menezes Filho, José M.V. Coutinho, John A.R. Stirling, Neil A. Ball, Elizabeth Moffatt, Mário L.S.C. Chaves, Paulo R.G. Brandão and Antônio W. Romano
 *E-mail: datencio@usp.br

New structure type

Orthorhombic: *Cmcm*; structure determined
 $a = 14.150(6)$, $b = 10.395(4)$, $c = 7.529(3)$ Å
 8.405(80), 7.081(100), 4.201(90), 3.333(60), 3.053(80), 2.931(70), 2.803(60), 2.589(50)
 Type material is deposited in the collections of the Museu de Geociências, Instituto de Geociências, Universidade de São Paulo, São Paulo, Brazil, registration number DR707
 How to cite: Atencio, D., Roberts, A.C., Cooper, M.A., Menezes Filho, L.A.D., Coutinho, J.M.V., Stirling, J.A.R., Ball, N.A., Moffatt, E., Chaves, M.L.S.C., Brandão, P.R.G. and Romano, A.W. (2011) Carlosbarbosaite, IMA 2010-047. CNMNC Newsletter No. 7, February 2011, page 28; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-048

Tarbagataite



Verkhnee Espe deposit, Akjailyautas mountains, Kazakhstan (N 48°0'3"–48°10" E 81°26"–81°29")

A.V. Stepanov, G.K. Bekenova, V.L. Levin, E. Sokolova* and F.C. Hawthorn

*E-mail: elena_sokolova@umanitoba.ca

Astrophyllite group

Triclinic: *P\bar{1}*; structure determined

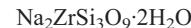
$a = 5.3868(3)$, $b = 11.9141(6)$, $c = 11.7171(6)$ Å
 $\alpha = 112.978(2)$, $\beta = 94.641(2)$, $\gamma = 103.189(2)$ °
 4.095(80), 3.735(30), 3.497(50), 3.258(100), 2.858(80), 2.761(70), 2.646(30), 2.560(50)

Type material is deposited in the collections of the Geological Scientific Museum of the Satpaev Institute of Geological Sciences, Almaty, Kazakhstan, registration number 3009/2010

How to cite: Stepanov, A.V., Bekenova, G.K., Levin, V.L., Sokolova, E. and Hawthorn, F.C. (2011) Tarbagataite, IMA 2010-048. CNMNC Newsletter No. 7, February 2011, page 28; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-049

Steedeite



Poudrette Quarry, Mont Saint-Hilaire, Quebec, Canada

Monika M. Haring, Andrew M. McDonald*, Glenn Poirier and Mark A. Cooper

*E-mail: amcdonald@laurentian.ca

Catapleiite group

Trigonal: *P\bar{3}1c*; structure determined

$a = 7.414(1)$, $c = 10.096(2)$ Å
 6.422(100), 5.414(65), 3.969(73), 3.065(69), 2.990(60), 2.713(41), 1.975(26), 1.856(27)

Type material is deposited in the collections of the Department of Natural History, Royal Ontario Museum, Toronto, Canada, catalogue number M55371

How to cite: Haring, M.M., McDonald, A.M., Poirier, G. and Cooper, M.A. (2011)

Steedeite, IMA 2010-049. CNMNC Newsletter No. 7, February 2011, page 28; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-051

Markascherite



Childs Aldwinkle mine, Bunker Hill District, Pinal County, Arizona, USA (32°45'07" N 110°28'55" W)

Hexiong Yang*, Robert A. Jenkins, Robert T. Downs, Stanley H. Evans and Elias M. Bloch
*E-mail: hyang@u.arizona.edu

Dimorph of szenicsite

Monoclinic: $P2_1/m$; structure determined
 $a = 5.5203(5)$, $b = 5.9900(5)$, $c = 9.9832(11)$ Å,
 $\beta = 97.586(2)^\circ$

5.124(65), 4.948(100), 3.450(54), 3.299(51),
3.006(53), 2.736(55), 2.580(88), 2.122(60)

Type material is deposited in the collections of the University of Arizona Mineral Museum, Tucson, Arizona, USA, catalogue number 19291
How to cite: Yang, H., Jenkins, R.A., Downs, R.T., Evans, S.H. and Bloch, E.M. (2011) Markascherite, IMA 2010-051. CNMNC Newsletter No. 7, February 2011, page 28; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-052

Rakovelite

$Na_3\{H_3[V_{10}O_{28}]\}\cdot15H_2O$

Sunday and the West Sunday mines, Slick Rock District, San Miguel County, Colorado, USA
Anthony R. Kampf, John M. Hughes*, Joe Marty, Mickey Gunter and Barbara Nash
*E-mail: jmhughes@uvm.edu

New structure type

Monoclinic: $P2_1/n$; structure determined
 $a = 12.0248(17)$, $b = 17.121(3)$, $c = 18.140(3)$ Å,
 $\beta = 106.242(8)^\circ$

11.270(100), 8.709(78), 7.696(81), 6.892(63),
3.445(24), 2.935(42), 2.798(31), 2.433(24)

Type material is deposited in the collections of the Natural History Museum of Los Angeles County, Los Angeles, California, USA, catalogue numbers 63357 and 63358

How to cite: Kampf, A.R., Hughes, J.M., Marty, J., Gunter, M. and Nash, B. (2011) Rakovanite, IMA 2010-052. CNMNC Newsletter No. 7, February 2011, page 29; *Mineralogical Magazine*, **75**, 27–31

NEW MINERAL PROPOSALS APPROVED IN DECEMBER 2010

IMA No. 2010-050

Veblenite

$KNa(Fe^{2+}_5Fe^{3+}_4Mn_7)Nb_4(Si_2O_7)_2(Si_8O_{22})_2O_6(OH)_{10}(H_2O)_3$

Ten Mile Lake, Seal Lake area, Labrador, Newfoundland, Canada

Fernando Cámará*, Elena Sokolova, Frank C. Hawthorne, Ralph Rowe, Joel Grice and Kim Tait

*E-mail: fernando.camaraartigas@unioito.it

New structure type

Triclinic: $P\bar{1}$; structure determined

$a = 5.3761(3)$, $b = 27.5062(11)$, $c = 18.6972(9)$ Å,
 $\alpha = 140.301(3)$, $\beta = 93.033(3)$, $\gamma = 95.664(3)^\circ$
18.204(22), 16.894(100), 11.661(8), 4.404(3),
4.271(9), 4.056(3), 3.891(2), 2.721(3)

The mineral is present in a holotype sample of niobophyllite housed in the collections of the Royal Ontario Museum, Toronto, Canada, catalogue number M26148

How to cite: Cámará, F., Sokolova, E., Hawthorne, F.C., Rowe, R., Grice, J. and Tait, K. (2011) Veblenite, IMA 2010-050. CNMNC Newsletter No. 7, February 2011, page 29; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-054

Hylbrownite

$MgNa_3P_3O_{10}\cdot12H_2O$

Dome Rock mine, 470 km northeast of Adelaide, South Australia, Australia (148°24'E 31°52'S)

Peter Elliott*, Joël Brugger and Tom Caradoc-Davies

*E-mail: peter.elliott@adelaide.edu.au

Mg analogue of kanonerovite

Monoclinic: $P2_1/n$; structure determined

$a = 14.722(3)$, $b = 9.240(2)$, $c = 15.052(3)$ Å,
 $\beta = 90.01(3)^\circ$

10.530(60), 7.357(80), 6.949(100), 5.835(30),
4.754(35), 3.934(40), 3.510(45), 3.336(35)

Type material is deposited in the collections of the South Australian Museum, Adelaide, South Australia, Australia, registration number G33088

How to cite: Elliott, P., Brugger, J. and Caradoc-Davies, T. (2011) Hylbrownite, IMA 2010-054. CNMNC Newsletter No. 7, February 2011, page 29; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-055

Rongibbsite

$Pb_2(Si_4Al)O_{11}(OH)$

Unnamed prospect, Big Horn Mountains, Maricopa County, Arizona, USA (33°69' N 113°22' W)

Hexiong Yang*, Robert A. Jenkins, Robert T. Downs, Stanley H. Evans, Elias M. Bloch, and Alex J. Halpern

*E-mail: hyang@u.arizona.edu

New structure type

Monoclinic: $C2/m$; structure determined

$a = 12.6018(10)$, $b = 13.9132(11)$, $c = 7.8356(6)$ Å, $\beta = 125.463(4)^\circ$

6.821(78), 6.075(100), 3.990(99), 3.481(81), 3.478(82), 3.322(76), 2.842(91), 2.753(87)

Type material is deposited in the collections of the Mineral Museum of the University of Arizona, Tucson, Arizona, USA, catalogue number 19292

How to cite: Yang, H., Jenkins, R.A., Downs, R.T., Evans, S.H., Bloch, E.M. and Halpern, A.J. (2011) Rongibbsite, IMA 2010-055. CNMNC Newsletter No. 7, February 2011, page 29 *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-056

Agardite-(Nd)

$\text{NdCu}_6(\text{AsO}_4)_3(\text{OH})_6 \cdot 3\text{H}_2\text{O}$

Hilarion Mine, Agios Konstantinos (Kamariza), Lavrion District, Greece

Igor V. Pekov*, Nikita V. Chukanov, Aleksandr E. Zadov, Panagiotis Voudouris, Andreas Magganas and Athanassios Katerinopoulos

*E-mail: igorpekov@mail.ru

Mixite group

Hexagonal: $P6_3/m$;

$a = 13.548(8)$, $c = 5.894(6)$ Å

11.70(100), 4.443(22), 3.545(18), 3.255(8), 2.935(18), 2.695(13), 2.559(10), 2.453(30)

Type material is deposited in the collections of the Fersman Mineralogical Museum of the Russian Academy of Sciences, Moscow, Russia, registration number 4020/1

How to cite: Pekov, I.V., Chukanov, N.V., Zadov, A.E., Voudouris, P., Magganas, A. and Katerinopoulos, A. (2011) Agardite-(Nd), IMA 2010-056. CNMNC Newsletter No. 7, February 2011, page 30; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-057

Panguite

$(\text{Ti},\text{Al},\text{Sc},\text{Mg},\text{Zr},\text{Ca})_{1.8}\text{O}_3$

Allende meteorite

Chi Ma*, Oliver Tschauner, George R. Rossman and Wenjun Liu

*E-mail: chi@gps.caltech.edu

New structure type

Orthorhombic: $Pbca$

$a = 9.781(1)$, $b = 9.778(2)$, $c = 9.815(1)$ Å
 $4.002(6)$, 3.995(7), 2.827(100), 1.732(18), 1.732(19), 1.729(19), 1.479(8), 1.475(9)

Type material is deposited in the collections of the Smithsonian Institution's National Museum of Natural History, Washington D.C., USA, catalogue number 7602

How to cite: Ma, C., Tschauner, O., Rossman,

G.R. and Liu, W. (2011) Panguite, IMA 2010-057. CNMNC Newsletter No. 7, February 2011, page 30; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-058

Cordylite-(La)

$\text{NaBaLa}_2(\text{CO}_3)_4\text{F}$

Biraya deposit, Vitim Plateau, Irkutsk district, Russia

Stuart J. Mills*, Pavel M. Kartashov, Anthony R. Kampf, Aleksei A. Konev, Anna A. Koneva and Mati Raudsepp

*E-mail: smills@eos.ubc.ca

Isomorphous with cordylite-(Ce)

Hexagonal: $P6_3/mmc$; structure determined

$a = 5.1182(5)$, $c = 23.1785(16)$ Å

4.371(65), 4.148(54), 3.532(100), 3.209(95), 2.562(89), 2.213(52), 2.051(44), 1.921(52)

Type material is deposited in the collections of the Mineral Sciences Department, Natural History Museum of Los Angeles County, Los Angeles, California, USA, catalogue number 63360, and the Fersman Mineralogical Museum of the Russian Academy of Sciences, Moscow, Russia, registration numbers 4028/1 and 4029/1 How to cite: Mills, S.J., Kartashov, P.M., Kampf, A.R., Konev, A.A., Koneva, A.A. and Raudsepp, M. (2011) Cordylite-(La), IMA 2010-058. CNMNC Newsletter No. 7, February 2011, page 30; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-061

Ferrisepiolite

$(\text{Fe}^{3+},\text{Fe}^{2+},\text{Mg})_4[(\text{Si},\text{Fe}^{3+})_6\text{O}_{15}] (\text{O},\text{OH})_2 \cdot 6\text{H}_2\text{O}$

Saishitang skarn copper deposit, Xinghai County, Qinghai Province, China (35°17'15"N 99°47'15"E)

Gu Xiangping*, Xie Xiande, Wu Xiangbin, Lai Jianqing, Kenich Hoshino and Zhu Guchang

*E-mail: gux2004@163.com

Fe(III)-dominant analogue of sepiolite

Orthorhombic: $Pn\bar{c}$

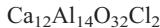
$a = 13.467(16)$, $b = 26.953(41)$, $c = 5.226(17)$ Å
 $12.034(100)$, 4.468(5), 3.742(6), 3.378(31), 3.184(4), 2.704(6), 2.552(5), 2.060(4)

Type material is deposited in the collections of the Geological Museum of China, People's Republic of China, catalogue number M11786

How to cite: Gu, X., Xie, X., Wu, X., Lai, J., Hoshino, K. and Zhu, G. (2011) Ferrisepiolite, IMA 2010-061. CNMNC Newsletter No. 7, February 2011, page 30; *Mineralogical Magazine*, **75**, 27–31

IMA No. 2010-062

Brearleyite



NWA 1934 CV3 carbonaceous chondrite

Chi Ma*, Harold C. Connolly, Jr., John R. Beckett, George R. Rossman, Anthony R. Kampf, Thomas J. Zega, Oliver Tschauner, Stuart A. Sweeney Smith and Devin L. Schrader
*E-mail: chi@gps.caltech.edu

Derivative of mayenite

Cubic: $I\bar{4}3d$; structure determined

$$a = 11.9794(5) \text{ \AA}$$

3.001(41), 2.685(100), 2.451(55), 2.192(33),
1.947(24), 1.665(42), 1.604(61), 1.310(22)

Type material is deposited in the collections of the Smithsonian Institution's National Museum of Natural History, Washington D.C., USA, catalogue number USNM 7590

How to cite: Ma, C., Connolly, Jr., H.C., Beckett, J.R., Rossman, G.R., Kampf, A.R., Zega, T.J., Tschauner, O., Sweeney Smith, S.A. and Schrader, D.L. (2011) Brearleyite, IMA 2010-062. CNMNC Newsletter No. 7, February 2011, page 31; *Mineralogical Magazine*, **75**, 27–31

Museum, Department of Natural History, 100 Queen's Park, Toronto, ON, Canada M5S 2C6, catalogue number M55369.

NOMENCLATURE PROPOSALS APPROVED IN DECEMBER 2010

IMA 10-E: The heteropolymolybdate family: new species, structural relationships and nomenclature scheme. A new suffix-based nomenclature is proposed for the heteropolymolybdate family. According to this nomenclature scheme, betpakdalite is renamed betpakdalite-CaCa, natrobetapkadalite is renamed betpakdalite-NaCa, mendozavilite is renamed mendozavilite-NaFe, and obradovicite is renamed obradovicite-KCu. The names melkovite and paramendozavilite are retained. Potential new species with proposed names “betpakdalite-CaMg”, “betpakdalite-NaNa”, “mendozavilite-NaCu”, “mendozavilite-KCa”, “obradovicite-NaCu” and “obradovicite-NaNa”, must be submitted to the CNMNC for evaluation by the usual new mineral approval procedure.

IMA 10-F: Proposal to rename ericssonite and orthoericssonite to ericssonite-*2M* and ericssonite-*2O*. Orthoericssonite is discredited, since it corresponds to the orthorhombic polytype of ericssonite. As a consequence, the remaining valid mineral ericssonite can show two polytypes: ericssonite-*2M* (previously named ericssonite), and ericssonite-*2O* (previously named orthoericssonite).

ERRATUM**IMA No. 2010-018**

Laurentianite

In CNMNC Newsletter No. 4 (Williams, P.A., Hatert, F., Pasero, M. and Mills, S.J. (2010) *Mineralogical Magazine*, **74**, 797–800), deposition data were given in error. The holotype is deposited in the collections of the Royal Ontario

