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Pharmacognostical Studies on the Crude Drug of "Agarwood" (II) On the Chinese Agarwood.

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Morphological and anatomical studies were carried out on Chinese agarwood and its original plant *Aquilaria sinensis* GILG., in comparison with *A. agallocha* ROXB. and *A. malaccensis* LAM. Chinese agarwood consisted of xylem and included phloem, and it was anatomically equivalent to the wood of *A. sinensis*. Furthermore there were no significant anatomical differences among *A. sinensis*, *A. agallocha* and *A. malaccensis*. In the essential fractions of Chinese agarwood, agarospirol, jinko-eremol, kusunol, dihydrokaranone and oxo-agarospirol were identified by GLC and GC-MS, although jinkohol and jinkohol II could not be detected.

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On the Herbal Collection List of Neo District by Yokusti Iinuma

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The authors obtained Yokusai Iinuma's herbal collection list in the Neo district of Mino province made in 1845. There is herbal collection in Imperial Museum, Tokyo. And then, these plant names were often cited in his literary works. Referring to these literary works, the plant name of this collection list was studied. It was thought that Keisuke Ito cited this collection list to his work "Production of Nippon." It was thought that this collection list gave a favorable influence upon the later botany.

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Morphological Alterations of the Fission Yeast *Schizosaccharomyces pombe* in the presence of Aculeacin A: Spherical Wall Formation.

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The fission yeast *S. pombe*, grown with aculeacin A (Acu), an antifungal antibiotic, forms spherical rather than cylindrical walls. This aberrant morphogenesis was studied under conditions in which over 90% of the cells continued to grow but with altered morphology. Microscopic observations and chemical analyses revealed that the spherical walls had a looser structure than the cylindrical wall and that their syntheses of alkali-insoluble glucan and mannan were reduced whereas the synthesis of alkali-soluble glucan was enhanced. Spherical walls of glutaraldehyde-fixed cells were hardly digested by a (1→3)- β -glucanase but were digested by a (1→3)- α -glucanase. The components and morphology of the spherical walls are discussed.