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# vim: fileencoding=utf-8
import MeCab

def co_occurrence(sent,word1,word2):
    t = MeCab.Tagger("-Owakati")
    sentence = t.parse(sent)
    sentList = sentence.split(" ")
    oc = 0
    for i in range(len(sentList)-1):
        if sentList[i] == word1 and sentList[i+1] == word2:
            oc += 1
    return oc

def co_occurrence2(sent,word1,word2):
    t = MeCab.Tagger("-Owakati")
    nodes = t.parseToNode(sent)
    nodes = nodes.next
    oc = 0
    while nodes:
        if nodes.surface == word1 and nodes.next.surface == word2:
            oc += 1
        nodes = nodes.next
    return oc

def trim_redundancy(list):
    BiWords = [" " for i in range(2)]
    BiWordList = []
    for i in range(len(list)-2):
        BiWords[0] = list[i]
        BiWords[1] = list[i+1]
        BiWordList.append(BiWords[0:2])
    NoRedundancyList = []
    BiWords = [" " for i in range(2)] #最初の参照に必要
    NoRedundancyList.append(BiWords)
    for item in BiWordList:
        isRedundant = False
        for itemNR in NoRedundancyList:
            if item[0] == itemNR[0] and item[1] == itemNR[1]:
                isRedundant = True
        if not isRedundant:
            NoRedundancyList.append(item)
    nrList = []
    del NoRedundancyList[0] #先頭の空白要素削除
    for item in NoRedundancyList:
        for elem in item:
            nrList.append(elem)
    return nrList

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