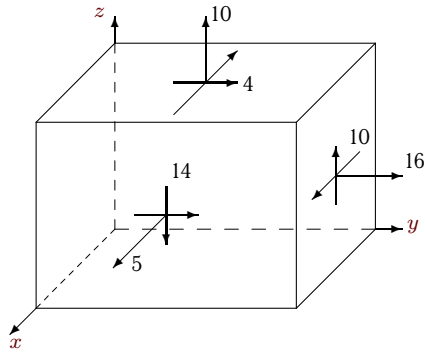


# Трехмерное напряженное состояние

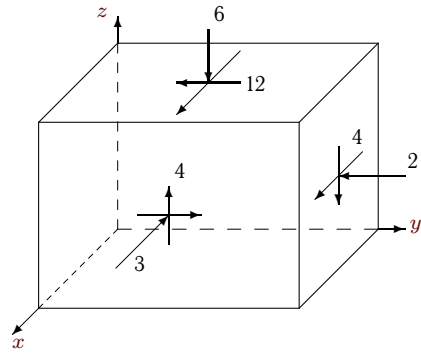
Найти главные нормальные и касательные напряжения. Вычислить октаэдрическое напряжение.

**Задача 5.1**



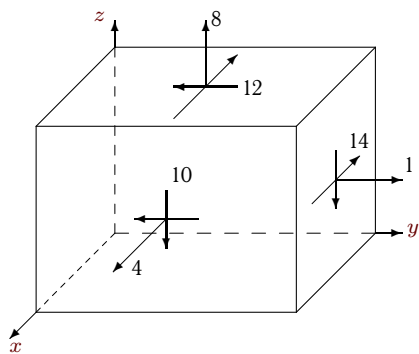
5.2

**Задача 5.2**



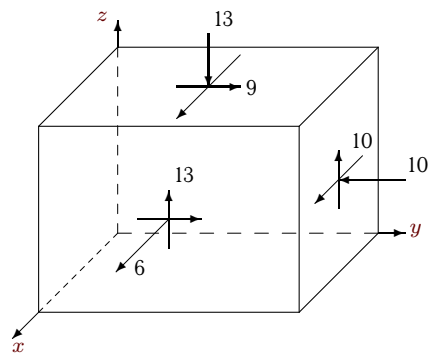
5.2

**Задача 5.3**



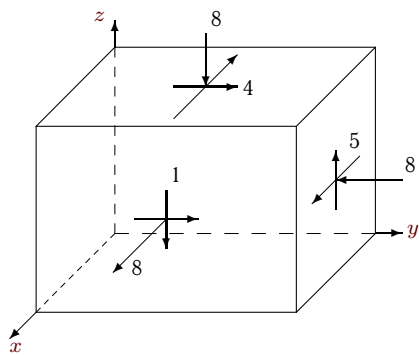
5.2

**Задача 5.4**



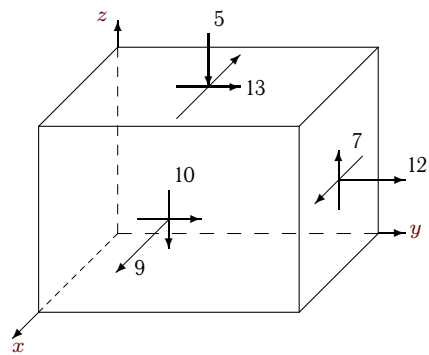
5.2

**Задача 5.5**



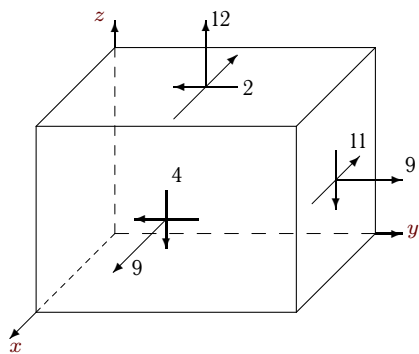
5.2

**Задача 5.6**



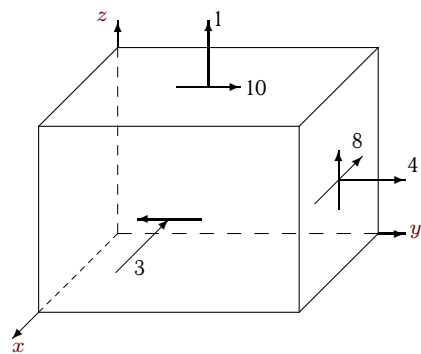
5.2

**Задача 5.7**



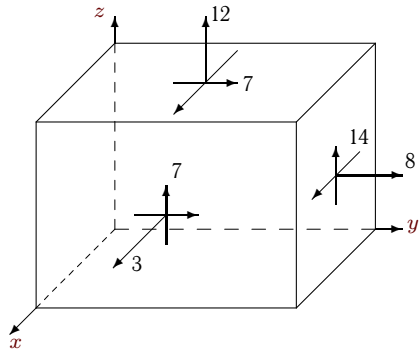
5.2

**Задача 5.8**



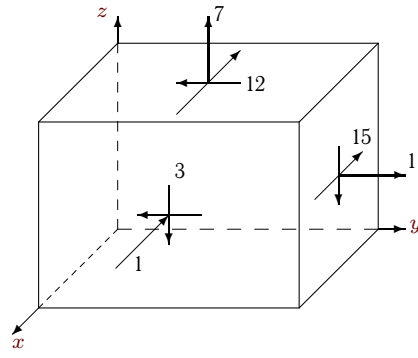
5.2

Задача 5.9



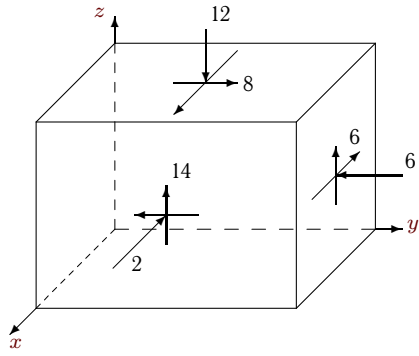
5.2

Задача 5.10



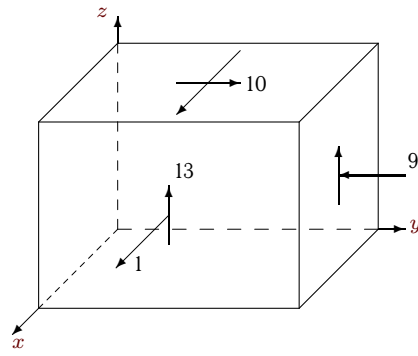
5.2

Задача 5.11



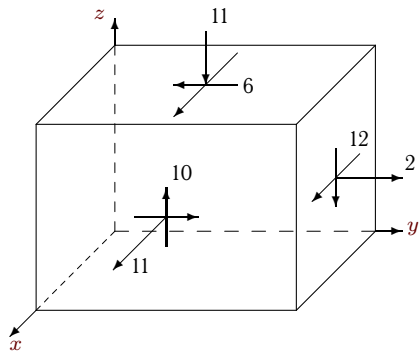
5.2

Задача 5.12



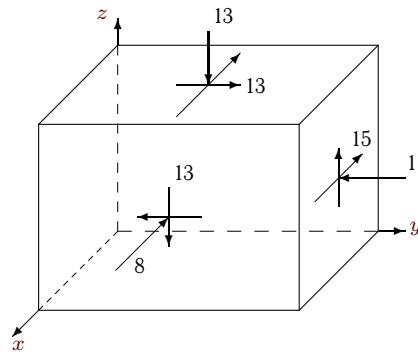
5.2

Задача 5.13



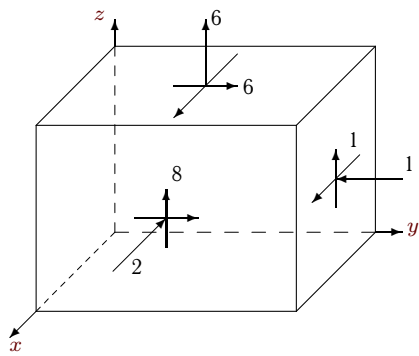
5.2

Задача 5.14



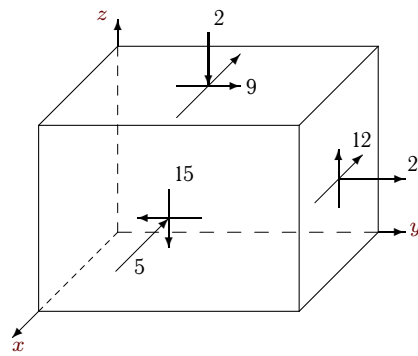
5.2

Задача 5.15



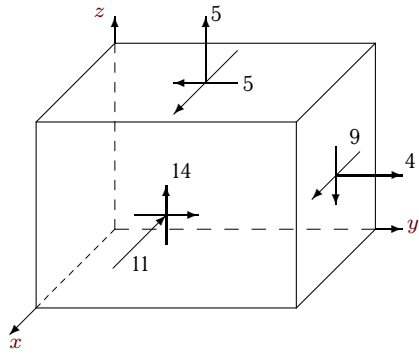
5.2

Задача 5.16



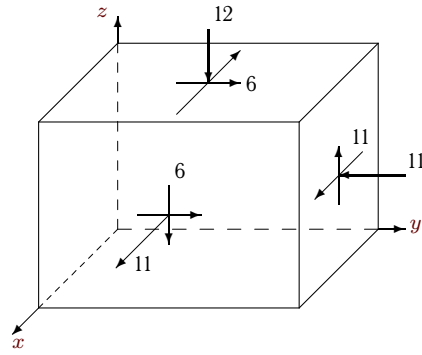
5.2

Задача 5.17



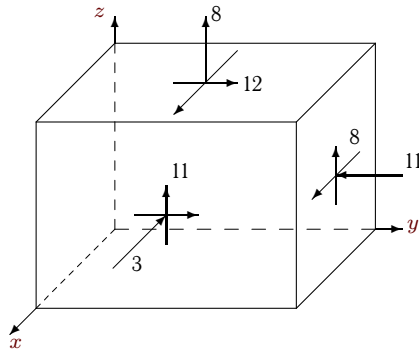
5.2

Задача 5.18



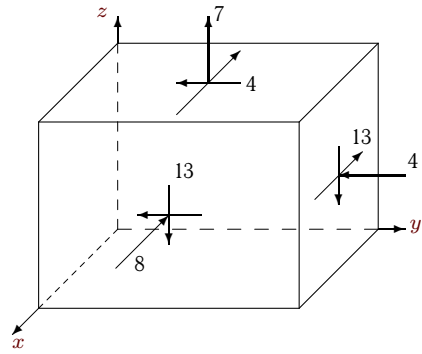
5.2

Задача 5.19



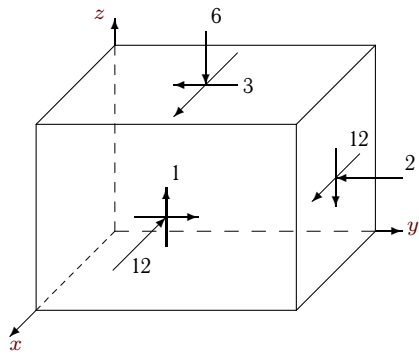
5.2

Задача 5.20



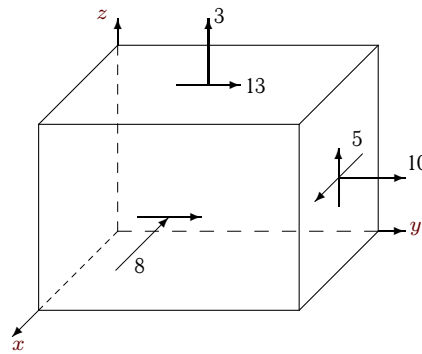
5.2

Задача 5.21



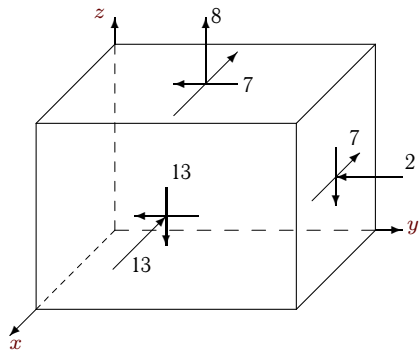
5.2

Задача 5.22



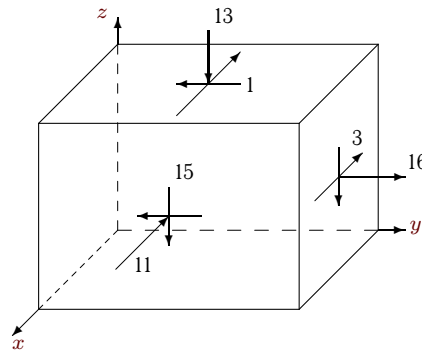
5.2

Задача 5.23



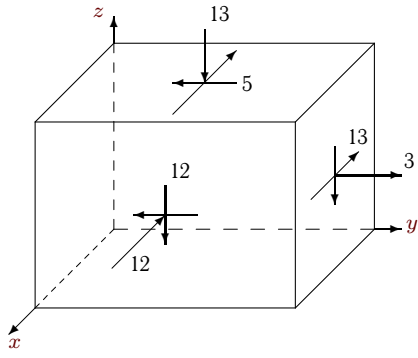
5.2

Задача 5.24



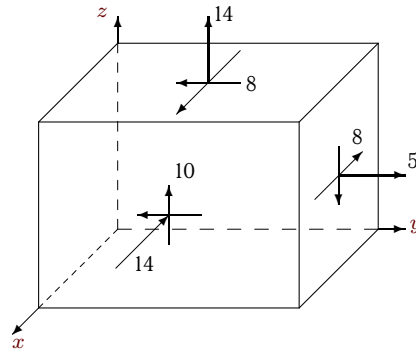
5.2

Задача 5.25



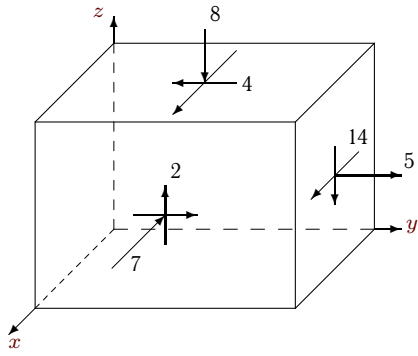
5.2

Задача 5.26



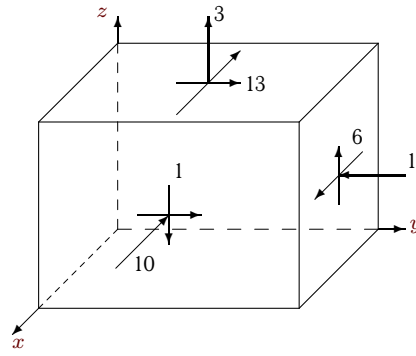
5.2

Задача 5.27



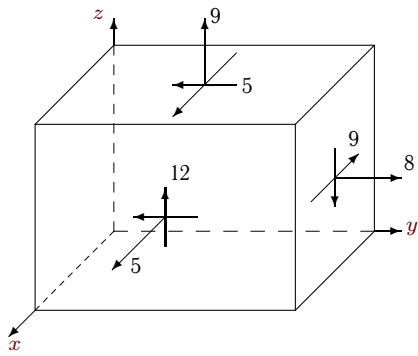
5.2

Задача 5.28



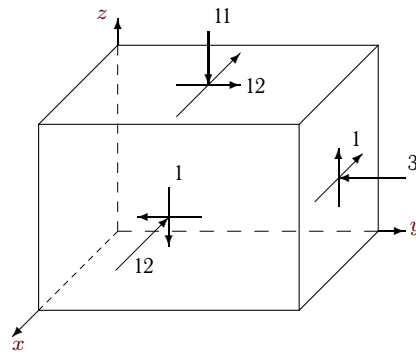
5.2

Задача 5.29



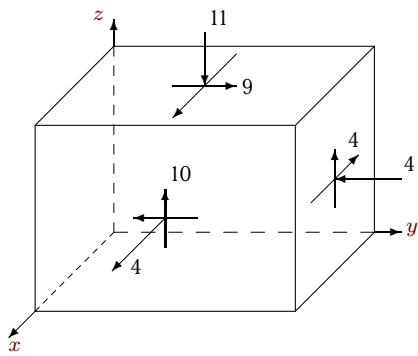
5.2

Задача 5.30



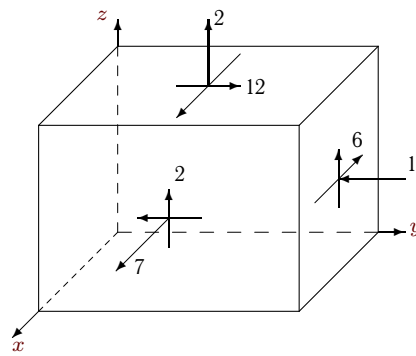
5.2

Задача 5.31



5.2

Задача 5.32



5.2

### Трехмерное напряженное состояние

	$J_1$	$J_2$	$J_3$	$\sigma_1$	$\sigma_2$	$\sigma_3$	$\tau_1$	$\tau_2$	$\tau_3$	$\tau_{okt}$
1	-31	-22	4536	24.108	17.589	-10.697	14.14	17.4	3.26	15.1070
2	11	-140	-140	8.188	-0.937	-18.251	8.66	13.22	4.56	10.9646
3	-13	-396	5572	17.119	16.099	-20.218	18.16	18.67	0.51	17.3654
4	17	-358	-5624	18.575	-14.099	-21.476	3.69	20.03	16.34	17.4037
5	8	-106	-552	9.435	-4.535	-12.900	4.18	11.17	6.99	9.2135
6	-16	-315	4836	19.376	14.200	-17.576	15.89	18.48	2.59	16.3367
7	-30	156	836	20.268	12.924	-3.192	8.06	11.73	3.67	9.7980
8	-2	-175	-224	14.824	-1.313	-11.512	5.1	13.17	8.07	10.8423
9	-23	-138	1231	26.457	5.308	-8.765	7.04	17.61	10.57	14.4760
10	-7	-379	2527	19.721	6.624	-19.345	12.98	19.53	6.55	16.2344
11	20	-188	-248	7.874	-1.180	-26.695	12.76	17.28	4.53	14.6363
12	8	-278	-1421	15.621	-4.845	-18.776	6.97	17.2	10.23	14.1264
13	-2	-401	694	20.173	1.729	-19.901	10.82	20.04	9.22	16.3775
14	22	-438	-9412	20.803	-19.037	-23.766	2.36	22.28	19.92	19.9889
15	-3	-117	-238	13.216	-2.265	-7.951	2.84	10.58	7.74	8.9443
16	5	-454	-3503	22.340	-8.186	-19.154	5.48	20.75	15.26	17.5563
17	2	-381	2394	13.131	7.912	-23.043	15.48	18.09	2.61	15.9652
18	12	-314	-2112	15.962	-6.034	-21.927	7.95	18.94	11	15.5349
19	6	-408	-3627	21.243	-9.773	-17.470	3.85	19.36	15.5	16.7332
20	5	-406	1507	15.194	4.085	-24.279	14.18	19.74	5.55	16.6199
21	20	-46	-758	6.312	-5.876	-20.436	7.28	13.37	6.1	10.9341
22	-5	-268	-1037	20.522	-4.647	-10.875	3.11	15.7	12.58	13.5728
23	7	-361	483	14.966	1.382	-23.348	12.37	19.16	6.8	15.8605
24	8	-476	1274	16.349	2.864	-27.212	15.04	21.78	6.74	18.2087
25	22	-257	-973	10.662	-3.085	-29.577	13.25	20.12	6.87	16.7000
26	-5	-424	200	23.032	0.469	-18.501	9.49	20.77	11.28	16.9771
27	10	-235	-1716	14.460	-6.672	-17.788	5.56	16.12	10.57	13.3749
28	8	-229	-1457	14.574	-6.051	-16.523	5.24	15.55	10.31	12.9185
29	-22	-93	566	24.828	3.566	-6.393	4.98	15.61	10.63	13.0213
30	26	55	-1370	5.759	-12.103	-19.656	3.78	12.7	8.93	10.6562
31	11	-213	292	9.022	1.504	-21.525	11.51	15.27	3.76	12.9957
32	3	-278	1488	9.898	7.404	-20.303	13.85	15.1	1.25	13.6870