n	C	A	D	D	$T_{\min}$	$T_{\max}$	$ST_{\min}$	$E_{\min}$	ST_{avg}	$ST_{\max}$	U	R
1	1	1	1	$_{0,0,1}$	1	1	1	1	1	1	1	1
2	2	2	2	$_{0,1,1}$	2	2	2	2	2	2	2	2
3	5	12	6	$_{1,1,1}$	4	8	3	3	4.667	6	4	4.5
4	14	55	18	$_{1,1,2}$	11	30	7	7	11.510	18	8.666667	10.6
5	42	273	60	$_{1,2,2}$	32	150	14	14	29.313	60	19.333333	25.6
6	132	1428	222	$_{2,2,2}$	96	780	27	27	75.799	222	44.200000	62.828571
7	429	7752	794	$_{2,2,3}$	305	4550	58	58	197.617	794	102.733333	155.958929
8	1430	43263	2988	$_{2,3,3}$			127	127	517.247	2988	241.834921	390.444048
9	4862	246675	11856	$_{3,3,3}$				266			574.914286	983.978857
10	16796	1430715	45580	$_{3,3,4}$							1377.587302	2492.993468
11	58786	8414640	180960	$_{3,4,4}$							3322.336508	6343.812317
12	208012	50067108	743160	$_{4,4,4}$							8055.810467	16201.746633
limit	4.0	6.75	4.5								$\approx 2.48\ldots$	$\geq\approx 2.65\ldots$

n inner points in a triangular convex hull

C = Catalan numbers

A = abstract stacked triangulations = ternary trees with n inner nodes and $2n-1$ leaves = $\binom{3n+1}{n}/(3n+1) \approx 6.75^n$

D = 3 chains, of lengths $_{i,j,k}$. The limit exponent of 4.5 has been established by Marc.

$T_{\min}, T_{\max}$ all triangulations of a point set (Oswin, from the database)

$ST_{\min}, ST_{\max}$ stacked triangulations of a point set (Oswin, from the database)

ST_{avg} Average over all realizable order types of the given cardinality (Oswin)

$E_{\min}$ lower bounds on stacked triangulations (Günter) It seems that the lower-bound examples (for n a multiple of 3) look like a series of nested concentric triangles, where successive levels are rotated by 180 degrees. The points lying close to a line through the center (they lie on both sides of the center) are probably not uniformly "curved" but they lie in such a way that a line through two such points cuts the points between them evenly. It remains to define such a family precisely and count the stacked triangulations for this family.

U = something random defined by the recursion $U_n = \sum_{i=1}^{n} U_{n-i} \cdot \frac{\sum_{j=1}^{i-1} U_{j-1} U_{i-1-j}}{i-1}$. (For $i = 1$, the value of the fraction is taken as 1.) Maybe this is something related to the degree-3-vertices?

R = average number of stacked triangulations on a random set, according to Emo's recursion $R_n = \sum_{i+j+k=n-1} R_i R_j R_k \cdot \frac{2}{n+1}$.

Prob[the balanced stacked triangulation with n inner vertices can be embedded on a random point set] $\approx 0.61886974^n$ (when n is of the form $(3^k - 1)/2$). This is probably $>$ Prob[any other fixed stacked triangulation with n inner vertices can be embedded on a random point set].