
Experimentations



1 Parameters

- Truck speed: **1**
- Drone speed: **3**
- Number of instances: **16**

2 Environment

- OS: **Linux - 4.19.0-kali4-amd64**
- Manufacturer + Product: **HP Pavilion 15 Notebook PC**
- CPU: **Intel(R) Core(TM) i5-4210U CPU @ 1.70GHz**
- Memory: **6GiB SODIMM DDR3 Synchrone Unbuffered (Unregistered) 1600 MHz (0,6 ns)**
- Julia Version: **1.1.1**
- Code Verbosity: **None**

3 Results

3.1 Optimal-TSP

Instance	Computational Results - Overview (1/1)								
	TSP			AEP (A1)			EP (A2)		
	z_1	z_2	Time (s)	z_1	z_2	Time (s)	z_1	z_2	Time (s)
"instance_10"	268.39	0.0	0.145997353	206.96	121.87	0.002402467	202.99	110.78	0.043823742
"instance_11"	289.11	0.0	0.092934014	206.66	111.7	0.001903538	194.47	100.71	0.043770766
"instance_12"	270.99	0.0	0.083039215	229.29	144.25	0.002000453	225.3	137.89	0.040977962
"instance_13"	281.2	0.0	0.17713828	218.51	130.27	0.003040608	214.68	125.42	0.027310078
"instance_14"	285.12	0.0	0.088482744	208.67	116.53	0.002996958	200.9	115.53	0.027085001
"instance_15"	284.87	0.0	0.074217347	223.07	131.05	0.003070404	216.49	117.77	0.02945404
"instance_16"	273.17	0.0	0.080962796	222.74	132.27	0.002122632	221.39	131.96	0.041374791
"instance_17"	280.19	0.0	0.085478055	219.77	130.07	0.00188714	217.5	125.74	0.040921667
"instance_18"	280.16	0.0	0.062782755	219.67	126.8	0.002503388	216.4	128.01	0.041657897
"instance_19"	287.79	0.0	0.113357436	221.36	128.65	0.002928671	213.15	126.84	0.042068042
"instance_20"	285.19	0.0	0.063364116	206.45	112.72	0.003161928	195.66	108.28	0.029558821
"instance_21"	281.39	0.0	0.10385982	201.02	109.57	0.003067714	194.8	102.39	0.026654841
"instance_22"	304.74	0.0	0.115548881	231.51	132.05	0.002012201	222.03	122.49	0.027138648
"instance_23"	277.41	0.0	0.091671468	208.57	118.0	0.001931779	205.12	124.8	0.028832643
"instance_24"	283.29	0.0	0.132873511	202.86	111.26	0.001861441	195.23	112.23	0.02744761
"instance_25"	281.42	0.0	0.075593621	209.87	119.4	0.001877647	202.6	114.74	0.072698717

3.2 Heuristic-TSP vs optimal-TSP

Computational Results - Overview (1/1)													
TSP via Concorde							TSP via LKH						
Instance	AEP (A1)			EP (A2)			AEP (A1)			EP (A2)			T (s)
	z_1	z_2	T (s)	z_1	z_2	T (s)	z_1	z_2	T (s)	z_1	z_2	T (s)	
"instance_10"	206.96	118.08	0.0035625	205.79	113.18	0.0451753	206.96	118.08	0.0037696	205.79	113.18	0.051862	
"instance_11"	206.66	112.75	0.0020217	200.92	106.98	0.0318862	206.66	111.7	0.0018184	194.47	100.71	0.0268187	
"instance_12"	229.29	139.97	0.0023181	224.54	139.15	0.0267792	229.29	144.25	0.0018636	225.3	137.89	0.0283764	
"instance_13"	218.51	130.27	0.0025161	214.68	125.42	0.0381215	218.51	126.26	0.0030443	210.9	119.96	0.0434713	
"instance_14"	208.67	115.21	0.0029951	197.48	107.13	0.0404862	208.67	115.21	0.0031598	197.48	107.13	0.0406639	
"instance_15"	223.07	131.05	0.0019109	216.49	117.77	0.0273446	223.07	130.37	0.001972	218.54	130.76	0.0269354	
"instance_16"	222.74	133.64	0.0018126	217.75	123.37	0.0271908	222.74	132.27	0.0034943	221.39	131.96	0.0409242	
"instance_17"	219.77	128.53	0.0018409	214.59	121.94	0.0279877	219.77	130.07	0.0019961	217.5	125.74	0.027181	
"instance_18"	219.67	126.8	0.0032187	216.4	128.01	0.0309082	219.67	126.61	0.0030212	212.93	131.09	0.0404335	
"instance_19"	221.36	127.33	0.0018286	217.96	129.47	0.0271861	221.36	128.65	0.0029907	213.15	126.84	0.0417108	
"instance_20"	206.45	112.89	0.0031266	199.01	104.6	0.0405701	206.45	112.72	0.0031706	195.66	108.28	0.0409751	
"instance_21"	201.02	109.57	0.0029468	194.8	102.39	0.0344869	201.02	110.99	0.0030745	193.17	101.93	0.0410322	
"instance_22"	231.51	132.05	0.0029711	222.03	122.49	0.0403555	231.51	132.05	0.0029583	222.03	122.49	0.0418392	
"instance_23"	208.57	118.0	0.0030821	205.12	124.8	0.040306	208.57	118.0	0.001965	205.12	124.8	0.0271975	
"instance_24"	202.86	111.26	0.0030452	195.81	109.23	0.04444	202.86	111.26	0.0021048	195.81	109.23	0.0271677	
"instance_25"	209.87	119.4	0.0019276	202.6	114.74	0.0267586	209.87	119.93	0.0031001	205.26	117.24	0.0409092	