

tol = 1e-3		Timing(1e3)	Timing(1e5)	Timing(1e8)	Timing(1e10)	Timing(1e11)	Timing(1e13)										
1		312.2098259	0.001199245453	0.001247882843	0.001338243484	0.001187086105	0.001191139221	0.001291036606									1
1		271.9390379	0.001177787781	0.001170873642	0.001484870911	0.001239061356	0.001172065735	0.001197098686									1
1		236.8626295	0.02835488319	0.02747321129	0.03087592125	0.02818202972	0.02761101723	0.02802801132									1
1		206.3105971	0.02183794975	0.02217817307	0.02134990692	0.02184691701	0.02192091942	0.02149605751									1
1		179.699358	0.01195907593	0.01220202446	0.01164484024	0.01213979721	0.01186203957	0.01206421852									1
1		156.520604	0.009593963623	0.009328126907	0.009196043015	0.009382963181	0.00904917717	0.009317159653									1
1		136.3315915	0.008357048035	0.008363962173	0.007949829102	0.008141040802	0.007973909378	0.008165836334									1
1		118.7466849	0.02499008179	0.0242193061	0.02568817139	0.02413582802	0.02392196655	0.02379179001									1
1		103.4299903	0.0151219368	0.0148768425	0.015583992	0.01478886604	0.0147819519	0.01484084129									1
1		90.08893926	0.01128983498	0.01104593277	0.01145291328	0.01111388206	0.01093792915	0.01099181175									1
1		78.46870096	0.01004481316	0.009886980057	0.009644985199	0.009789228439	0.009606122971	0.01002812386									1
1		68.34731413	0.008650064468	0.008780956268	0.008720874786	0.00877904892	0.008560180664	0.008592844009									1
1		59.53144746	0.009196043015	0.009236097336	0.009431838989	0.009047031403	0.009005784988	0.008967161179									1
1		51.85270674	0.01343011856	0.01283311844	0.01344799995	0.01310801506	0.0132188797	0.01334500313									1
1		45.16441833	0.01295781136	0.01275587082	0.01321196556	0.01273298264	0.01328086853	0.01271176338									1
1		39.33882744	0.01257371902	0.01248717308	0.01321530342	0.01258683205	0.01327204704	0.01255011559									1
1		34.26465793	0.01963114738	0.01958489418	0.02126073837	0.01946997643	0.01999497414	0.01886200905									1
1		29.84498673	0.02602910995	0.02597689629	0.02704310417	0.02649497986	0.02697372437	0.02599310875									1
1		25.99539253	0.03243684769	0.03207993507	0.03332304955	0.03264904022	0.03257966042	0.03254008293									1
1		22.64234322	0.09228205681	0.0922961235	0.09418582916	0.09306716919	0.09453225136	0.0950961113									1
1		19.72179131	0.1042430401	0.1035301685	0.1062090397	0.1055440903	0.1059513092	0.1061971188									1
1		17.17795056	0.2433242798	0.246297121	0.2436280251	0.2515120506	0.2446212769	0.2452740669									1
1		14.9622304	0.1704821587	0.1687321663	0.1692869663	0.1711177826	0.1764452457	0.173539104									1
1		13.03230777	0.1751449108	0.1765611172	0.1743092537	0.1941592693	0.177310371	0.1803519726									1
1		11.3513187	0.1530082226	0.155629158	0.1520631313	0.1787981987	0.1576251984	0.1531450748									1
1		9.887154185	0.1226029396	0.1228880882	0.1305189133	0.1259419918	0.1240530014	0.1222016811									1
1		8.611846821	0.1293509007	0.1230480671	0.1295659542	0.1265881062	0.1243069172	0.1224067211									1
1		7.501036625	0.1391386986	0.1394548416	0.1452870369	0.1425988674	0.1420919895	0.1395261288									1
1		6.533505719	0.1237852573	0.1202452183	0.1231601238	0.1227059364	0.1238000393	0.1198830605									1
1		5.690773037	0.1623501778	0.1688098907	0.1667201519	0.164963007	0.1653740406	0.1610598564									1
1		4.95674132	0.1201090813	0.1202046871	0.1248049736	0.1223099232	0.1241390705	0.1195189953									1
1		4.317389633	0.1648831367	0.1649479866	0.1690580845	0.1665661335	0.1724338531	0.1640651226									1
1		3.76050555	1.651462078	1.64064908	1.702883244	1.67922616	1.677232742	1.641315699									1
1		3.27545188	0.3373551369	0.3361420631	0.3527779579	0.345015049	0.3380908966	0.3329298496									1
1		2.852963485	0.1294147968	0.1292750835	0.1333250999	0.1311450005	0.1311879158	0.1282858849									1
1		2.484970301	0.1301980019	0.1288011074	0.1335308552	0.1325209141	0.1299037933	0.1284358501									1
1		2.164443194	0.2294230461	0.2260808945	0.2336518764	0.2295386791	0.2279868126	0.2252848148									1
1		1.885259691	0.09445214272	0.09408473969	0.09667372704	0.09514284134	0.09522223473	0.09360408783									1
1		1.642087032	0.0930659771	0.09234905243	0.09559822083	0.09327578545	0.09259700775	0.09330606461									1
1		1.430280314	0.09342217445	0.0939078331	0.09639310837	0.09338498116	0.09320187569	0.095236063									1
1		1.245793758	0.09128117561	0.0928838253	0.09512710571	0.09155392647	0.09183907509	0.09426617622									1
1		1.08510344	0.2208631039	0.2270052433	0.2307519913	0.2246351242	0.2230930328	0.2205369473									1
1		0.9451399698	0.2236919403	0.2208790779	0.2301292419	0.2341701984	0.2234847546	0.2209300995									1
1		0.823229869	0.3765289783	0.3698987961	0.3874459267	0.3922679424	0.3737499714	0.3686318398									1
1		0.7170445	0.6783871651	0.6651501656	0.686634779	0.6744980812	0.6758458614	0.6770329475									1
1		0.6245555882	0.4485399723	0.4452791214	0.4509549141	0.4502520561	0.4514791965	0.4432330132									1
1		0.5439964783	0.2982139587	0.301484108	0.2985153198	0.3012280464	0.311372757	0.308079958									1
1		0.4738283892	0.2243552208	0.2249589866	0.2357439995	0.2262580395	0.2281508446	0.2289180756									1
1		0.4127110219	0.2233510017	0.2220118046	0.2286798954	0.2267410755	0.2235770226	0.2298407555									1
1		0.3594769572	0.2230257988	0.2236690521	0.2303340435	0.2265908718	0.226323843	0.2286069393									1
0.1		130.2016103	0.001170158386	0.00116810527	0.001183986664	0.001176834106	0.001182794571	0.001187086105									1
0.1		113.4073873	0.001178264618	0.001165866852	0.001178026199	0.001156806946	0.00116777742	0.001164913177									1
0.1		98.77938883	0.001160144806	0.001160144806	0.001176834106	0.001204252243	0.00116610527	0.001164197922									1
0.1		86.03820166	0.00120973587	0.001252889633	0.001349925995	0.001219034195	0.001182794571	0.001286745071									1
0.1		74.94045299	0.001204967499	0.001275777817	0.001227855682	0.00131893158	0.001164197922	0.001206874847									1
0.1		65.27416178	0.001160144806	0.001165866852	0.001230716705	0.00123500824	0.001154184341	0.001167058945									1
0.1		56.85468964	0.001209974289	0.0011677742	0.001231908798	0.001214027405	0.001162052155	0.001180887222									1
0.1		49.52121399	0.001183986664	0.001158714294	0.001275062561	0.001163005829	0.001155138016	0.00124502182									1
0.1		43.13365619	0.001256942749	0.001152038574	0.00118303299	0.001173019409	0.001295804977	0.00121307373									1
0.1		37.57000578	0.001180887222	0.001193284988	0.001158906387	0.001238107681	0.00125002861	0.001163005829									1
0.1		32.72399002	0.00116610527	0.001171112061	0.001154899597	0.00134396553	0.001248836517	0.001151800156									1
0.1		28.50304386	0.001199960709	0.001180887222	0.001153707504	0.001170873642	0.001195907593	0.001508951187									1
0.1		24.8265419	0.01424407959	0.0141677039	0.01440310478	0.01374721527	0.01467680931	0.01418972015									1
0.1		21.6242583	0.004003763199	0.00407043564	0.004234075546	0.004081726074	0.004099845886	0.004176855087									1
0.1		18.83502538	0.003890991211	0.003983259201	0.003949165344	0.004158973694	0.004055023193	0.004098653793									1
0.1		16.40565628	0.004101753235	0.003810167313	0.004101991653	0.003901004791	0.004086971283	0.003979921341									1
0.1		14.28947224	0.004155158997	0.004020929337	0.0038189888	0.004049777985	0.003991127014	0.004196882248									1
0.1		12.44632619	0.003868103027	0.004048109055	0.004182100296	0.00396490097	0.004108905792	0.003910779953									1
0.1		10.84092071	0.01187300682	0.01143813133	0.01191902161	0.01159405708	0.01159334183	0.01170372963									1
0.1		9.442590541	0.00528383255	0.005203962326	0.005154848099	0.005378007889	0.0052										

0.1	4.1232054	0.009112119675	0.009160995483	0.009650545663	0.009187936783	0.009128093719	0.009038925171		
0.1	3.591419074	0.06154227257	0.06110620499	0.06347084045	0.06266069412	0.06183314323	0.0622651577		
0.1	3.128175242	0.1457800965	0.1454007626	0.1478309631	0.1486358643	0.1537129679	0.1474530697		1
0.1	2.724683514	0.0548585371	0.0539929868	0.05598187447	0.05509114265	0.05504584312	0.05456185341		1
0.1	2.373236689	0.08938694	0.08786892891	0.09123301506	0.08958506584	0.08779978752	0.09000706673		1
0.1	2.067121686	0.2848577499	0.2811350822	0.2878649235	0.2873799801	0.2864778042	0.286482811		1
0.1	1.800491323	0.5175082684	0.5105080605	0.5184078217	0.5127880573	0.5086882114	0.511713028		1
0.1	1.568252622	0.5614862442	0.5593719482	0.5772678852	0.563341856	0.5573358536	0.578576088		1
0.1	1.36596953	0.4294309616	0.4341037273	0.4410984516	0.4276437759	0.4273908138	0.4315881729		1
0.1	1.189778185	0.2775681019	0.2713580132	0.2761518955	0.2715919018	0.2746920586	0.2715320587		1
0.1	1.036313107	0.08284378052	0.08262300491	0.0841422081	0.08301115036	0.08276104927	0.08648705482		1
0.1	0.9026429215	0.177959919	0.1746618748	0.1809518337	0.1761689186	0.1770401001	0.178194046		1
0.1	0.7862143573	0.2002530098	0.2006289959	0.2038097382	0.2010560036	0.2001242638	0.2035069466		1
0.1	0.684803482	0.06416106224	0.06377506256	0.06516814232	0.06389808655	0.06382894516	0.0649600029		1
0.1	0.5964732196	0.6498808861	0.6471068859	0.6557538509	0.6420118809	0.6372029781	0.6530208588		1
0.1	0.5195363502	0.6452877522	0.6400539875	0.652256012	0.6540198326	0.6454861164	0.6506948471		1
0.1	0.4525232825	2.366388083	2.356348038	2.407299995	2.369400024	2.346520901	2.409857035		1
0.1	0.3941539819	0.299052	0.2982299328	0.3029208183	0.3061649799	0.2986578941	0.3010568619		1
0.1	0.3433135209	0.475512743	0.4778461456	0.4884662628	0.4821910858	0.4835348129	0.4787170887		1
0.1	0.2990307826	0.7898981571	0.7774682045	0.7973182201	0.7822380066	0.783714056	0.7996239662		1
0.1	0.2604599105	0.820887804	0.8228082657	0.8423779011	0.8200597763	0.8324010372	0.836550951		1
0.1	0.2268641523	0.2477490902	0.245923996	0.2503378391	0.2467858791	0.2512478828	0.24680686		1
0.1	0.1976017863	0.1338999271	0.1332399845	0.1351191998	0.1329379082	0.135614872	0.1330649853		1
0.1	0.1721138644	0.1149120331	0.1137371063	0.1143767834	0.1140811443	0.1165187359	0.1167817116		1
0.1	0.1499135351	1.673701048	1.651657343	1.687069178	1.64931488	1.67060709	1.670146227		1
0.1	28.21196323	0.001168251038	0.001183986664	0.001202821732	0.001163959503	0.001165866852	0.001202344894		1
0.01	24.57300668	0.00116109848	0.001170873642	0.001259088516	0.001194000244	0.00120806694	0.001175880432		1
0.01	21.40342565	0.001160144806	0.001157999039	0.001173019409	0.001277923584	0.00115609169	0.001164197922		1
0.01	18.64267712	0.0011178264618	0.0011226186752	0.001213312149	0.001193284988	0.001204967499	0.001209020615		1
0.01	16.23802731	0.00125002861	0.001163005829	0.00120306015	0.001219034195	0.001235961914	0.001287221909		1
0.01	14.14354437	0.001174211502	0.001164913177	0.001303911209	0.001313209534	0.001223272055	0.001184940338		1
0.01	12.31922101	0.001190900803	0.001271009445	0.001231193542	0.001165151596	0.001159906387	0.00121307373		1
0.01	10.73021036	0.001180887222	0.001163005829	0.001196861267	0.001149892807	0.00115275383	0.001152038574		1
0.01	9.346160307	0.001234054565	0.001163959503	0.001163005829	0.001145839691	0.001148223877	0.001236915588		1
0.01	8.140633737	0.001188755035	0.001169919968	0.001150846481	0.00115778062	0.001182079315	0.001293897629		1
0.01	7.090603571	0.001155138016	0.001142024994	0.00116610527	0.001140117645	0.001217126846	0.00119304657		1
0.01	6.176012902	0.001153707504	0.001153945923	0.001149892807	0.001301050186	0.001153945923	0.001223087301		1
0.01	5.373931894	0.001235961914	0.001363992691	0.001142024994	0.001232147217	0.001219749451	0.001184225082		1
0.01	4.685524076	0.001164913177	0.001176118851	0.001149177551	0.00115609169	0.001157045364	0.001290082932		1
0.01	4.081155696	0.001187086105	0.001154184341	0.0011172780991	0.00116109848	0.001241922379	0.001255273819		1
0.01	3.554742552	0.001200914383	0.001219034195	0.001168966293	0.001229763031	0.001200199127	0.00115150849		1
0.01	3.096229489	0.001152038574	0.001189947128	0.001353025436	0.001176118851	0.001160144806	0.001147985458		1
0.01	2.696858325	0.001207828522	0.00119304657	0.001276254654	0.00118303299	0.001159191132	0.001196861267		1
0.01	2.349005668	0.009709119797	0.009420871735	0.009887933731	0.01006293297	0.009778022766	0.009869098663		1
0.01	2.046011693	0.002752780914	0.002811908722	0.002823829651	0.002743244171	0.002666950226	0.002504825592		1
0.01	1.782104229	0.002606153488	0.002516031265	0.002798080444	0.002645015717	0.002486944199	0.00261092186		1
0.01	1.552237212	0.00140786171	0.001306772232	0.001412153244	0.001467227936	0.001359939575	0.001415729523		1
0.01	1.352019888	0.001368045807	0.001348733902	0.001322031021	0.001471996307	0.001362800598	0.001305103302		1
0.01	1.177627855	0.001381874084	0.001470088959	0.001327991486	0.001359701157	0.001327037811	0.00132727623		1
0.01	1.025730004	0.0109886169	0.01077985764	0.0107820034	0.01087784767	0.01092505455	0.01093363762		1
0.01	0.8934248931	0.002655982971	0.002454042435	0.002579927444	0.002550125122	0.0026070764923	0.002577066422		1
0.01	0.7781853282	0.002613067627	0.002470970154	0.00244474411	0.002461194992	0.002547979355	0.002491950989		1
0.01	0.6778100876	0.001351833344	0.001316070557	0.0013692379	0.001424312592	0.001400947571	0.001461744308		1
0.01	0.5903818772	0.00150912857	0.001540184021	0.001455783844	0.001523017883	0.001402854919	0.001411914825		1
0.01	0.5142307075	0.01932811737	0.01899194717	0.01892089844	0.01892805099	0.01872992516	0.01886105537		1
0.01	0.4479019949	0.002950906754	0.003111362457	0.0029863093262	0.003140926361	0.003051996231	0.002944946289		1
0.01	0.3901287771	0.04517388344	0.04483008365	0.04550790787	0.04497170448	0.0447781086	0.04471969604		1
0.01	0.3398075124	0.0530538559	0.05131578445	0.05158686638	0.05192804337	0.05224106966	0.05211997032		1
0.01	0.2959770011	0.01142191887	0.01176333427	0.01149201393	0.0115070343	0.01141929626	0.01128792763		1
0.01	0.257800025	0.01068902016	0.01107287407	0.0107421875	0.0106010437	0.01066589355	0.01070213318		1
0.01	0.2254573555	0.07357192039	0.07560682297	0.07480716705	0.07353997231	0.07292914391	0.07471084595		1
0.01	0.1955838246	0.01488865608	0.01538491249	0.01480221748	0.01493692398	0.01486063004	0.01462984085		1
0.01	0.1703561921	0.1873040199	0.1860358715	0.1923182011	0.1886789799	0.1884973049	0.1857297421		1
0.01	0.1483825784	0.07049179077	0.07005810738	0.07094717026	0.07221889496	0.07133316994	0.06994104385		1
0.01	0.1292432597	0.02146410942	0.02155399323	0.02163004875	0.02166104317	0.02174901962	0.02138090134		1
0.01	0.1125726508	0.06979203224	0.06914687157	0.0703599453	0.06991696358	0.07017207146	0.06987118721		1
0.01	0.09805232189	0.07199478149	0.07194209099	0.07322883606	0.07259828794	0.07187771797	0.0716612339		1
0.01	0.0850491639	0.09803295135	0.09299612045	0.09803700447	0.0930659771	0.09347891808	0.09180784225		1
0.01	0.07438885284	0.02251005173	0.02208590508	0.02318406105	0.02218079567	0.02217102051	0.02218103409		1
0.01	0.06479371048	0.09036684036	0.08719567326	0.0888979435	0.08900570869	0.08802485466	0.08724188805		1
0.01	0.05643620997	0.2419130802	0.2381019592	0.2493069172	0.2451460361	0.2414138317	0.2383341789		1
0.01	0.04915671247	0.03949308395	0.0398888588	0.039935112	0.03979897499	0.03966784477	0.03906679153		1
0.01	0.04281617036	0.2062139511	0.2069041729	0.211815834	0.2106678486	0.2202441692	0.2051451206		1
0.01	0.03729347128	0.03944706917	0.03912806511	0.04219388962	0.04052424431	0.04128885269	0.03963184357		1
0.01	0.03248312467	0.03855013847	0.03814077377	0.03857183456	0.03905797005	0.03881692886	0.03834966687		1