1d) Table: Different training losses for different models Model | L_2 loss | L_2 loss | L_inf loss L_2 Model | 0.02195529826247768 | 0.023044304535428106 | 0.02796169729737883 L_1 Model | 0.16699146530459466 | 0.15706138462087946 | 0.20572626053247667 L_inf Model |5.00974395913784 | 4.711841538626384 | 6.1717878159743 Table: Different test losses for different models Model | L_2 loss | L_2 loss | L_inf loss L 2 Model | 0.0197020636144262 | 0.01976465141082499 | 0.02394708648907498 L_1 Model | 0.15908510988891536 | 0.15889173091578115 | 0.17452235311639228 L inf Model | 159.08510988891535 | 158.89173091578115 | 174.52235311639228 Table: Different training losses for different models Model | L_2 loss | L_2 loss | L_inf loss L_2 Model | 0.008752817096550427 | 0.010677393902190128 | 0.012263669973475017 L_1 Model | 0.10567865679129301 | 0.09725614502158306 | 0.12456209232930808 L inf Model |3.1703597037387903 | 2.917684350647492 | 3.7368627698792425 Table: Different test losses for different models Model | L 2 loss | L 2 loss | L inf loss L_2 Model |0.02125981235371155 | 0.021385321561594627 | 0.024019361084271395 L_1 Model | 0.16321793303009113 | 0.16269328015306836 | 0.1760734900880556 L_inf Model | 163.21793303009113 | 162.69328015306837 | 176.0734900880556 Table: Different training losses for different models Model | L_2 loss | L_2 loss | L_inf loss L_2 Model |0.013499382685245327 | 0.016085967030890914 | 0.014062858114292679 L_1 Model |0.1374416653875065 | 0.13081120494045734 | 0.1425706482457309

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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.01811270124466558 | 0.018139438173941418 | 0.021578814672670442
L_1 Model | 0.15129302090387506 | 0.15115310072181126 | 0.16388770757099552
L_inf Model | 151.29302090387506 | 151.15310072181126 | 163.88770757099553
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L 2 Model | 0.01836494334840313 | 0.020616546465203448 | 0.023941239912593514
L 1 Model | 0.14688834208972787 | 0.14146647609786295 | 0.19300674644327778
L_inf Model |4.406650262691836 | 4.243994282935889 | 5.790202393298333
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L_2 Model |0.019954625722984832 | 0.02009395211604993 | 0.024845952561566614
 L_1 Model | 0.15678943939460993 | 0.1560642563825354 | 0.17791271383917867
L_inf Model | 156.78943939460993 | 156.0642563825354 | 177.91271383917868
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.01977439659798246 | 0.023341171632482092 | 0.02400850911734353
 L 1 Model | 0.1491691531435136 | 0.13609773657351282 | 0.168581544897101
L inf Model |4.475074594305408 | 4.082932097205385 | 5.05744634691303
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.020197943031174215 | 0.02021148145235356 | 0.02248442769788625
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L 1 Model | 0.15856663652556244 | 0.15845711980105193 | 0.1682351076162827
L_inf Model | 158.56663652556244 | 158.45711980105193 | 168.23510761628268
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.023272401838622128 | 0.026282207199102556 | 0.037756658929304035
L_1 Model | 0.17567463117836707 | 0.1682102648589518 | 0.23991638474877602
L_inf Model |5.270238935351012 | 5.046307945768554 | 7.197491542463281
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L 2 Model | 0.020592790241771863 | 0.020615236170335578 | 0.0212975800839843
L_1 Model | 0.16135105956172308 | 0.1612602919183508 | 0.16303059973182218
L inf Model | 161.35105956172308 | 161.26029191835082 | 163.03059973182218
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model | 0.025561731373163518 | 0.02700896285585302 | 0.04095806026468084
L_1 Model | 0.16237515903538105 | 0.15329995913498928 | 0.24184609096281534
L_inf Model |4.871254771061431 | 4.5989987740496785 | 7.25538272888446
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.019664026005465223 | 0.019730992903327672 | 0.023746824457817946
 L 1 Model | 0.15879953665174926 | 0.1584758139969644 | 0.1759517818375853
L inf Model | 158.79953665174926 | 158.4758139969644 | 175.95178183758532
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
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L 2 Model | 0.018740472294329028 | 0.020933606503146115 | 0.02866589521652946
L_1 Model | 0.1557593917770396 | 0.15048554286773666 | 0.2130017324151519
L inf Model | 4.672781753311188 | 4.5145662860321 | 6.3900519724545575
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.021154136065387248 | 0.021179284315651997 | 0.025332955417215842
L_1 Model |0.16459562459493282 | 0.16444944258245328 | 0.1807055582238245
L_inf Model |164.59562459493281 | 164.4494425824533 | 180.7055582238245
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.022242110070891653 | 0.02400775720521399 | 0.034131974670979184
 L 1 Model | 0.15869005354073515 | 0.14739314359056352 | 0.22613158746331788
L_inf Model |4.760701606222055 | 4.4217943077169055 | 6.783947623899536
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.0197634341675143 | 0.01982160668589218 | 0.026455292665964133
L_1 Model | 0.15845402911250941 | 0.15811057197664155 | 0.18394812172343328
L inf Model | 158.4540291125094 | 158.11057197664155 | 183.94812172343327
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.017491947452888276 | 0.023213383084767725 | 0.02198782403340773
 L 1 Model | 0.15540583284476012 | 0.1401896601199901 | 0.18767401773164544
L_inf Model |4.662174985342803 | 4.205689803599703 | 5.630220531949363
```

Table: Different test losses for different models

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Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02055199785119886 | 0.020596709192683648 | 0.0274072573953328
 L 1 Model | 0.16081213330529476 | 0.16051348235361723 | 0.1891471656638954
L_inf Model | 160.81213330529476 | 160.51348235361723 | 189.14716566389538
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.01752766841269136 | 0.022876187775553662 | 0.02172128892139564
L_1 Model | 0.15198214131621757 | 0.13898286462774895 | 0.179182242341092
L inf Model |4.559464239486527 | 4.1694859388324685 | 5.37546727023276
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.019723822233585493 | 0.01981149735224863 | 0.01994437617311476
 L_1 Model | 0.15830820611167745 | 0.1579533536186054 | 0.15985032233238264
L inf Model | 158.30820611167746 | 157.9533536186054 | 159.85032233238263
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.017237742295462686 | 0.0198913753113182 | 0.026700130610797658
L 1 Model | 0.15452045528683148 | 0.14924771737670436 | 0.19780218185001752
L inf Model | 4.635613658604944 | 4.477431521301131 | 5.934065455500526
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.019603675781241208 | 0.019644203944078037 | 0.026562389456833986
 L 1 Model | 0.1588895428490465 | 0.1586832389091324 | 0.1864418865107403
L inf Model | 158.8895428490465 | 158.6832389091324 | 186.44188651074032
```

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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02021587831923378 | 0.02194420063035372 | 0.02839060931181086
L_1 Model | 0.16890493649783195 | 0.16127066417244648 | 0.20900082028351893
L inf Model | 5.067148094934958 | 4.838119925173395 | 6.270024608505568
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.020167929598441117 | 0.020259476682990444 | 0.022074257023379132
L 1 Model | 0.1615694442155779 | 0.161161882769433 | 0.16728410797673182
L_inf Model | 161.5694442155779 | 161.161882769433 | 167.28410797673183
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.015055036514925624 | 0.017204557930210005 | 0.01782540718920499
 L_1 Model | 0.13978420950322593 | 0.1318113528920079 | 0.16488804970680995
L_inf Model |4.193526285096778 | 3.954340586760237 | 4.946641491204298
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.0194274902233011 | 0.01947533086830826 | 0.022905709815673466
 L 1 Model | 0.15791806679017686 | 0.15765322473828938 | 0.17367316793498902
L inf Model | 157.91806679017685 | 157.6532247382894 | 173.673167934989
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.016650448363992425 | 0.020698016535881214 | 0.022569858873778586
 L 1 Model | 0.14726263832033928 | 0.13669701540107532 | 0.1850684383999022
L_inf Model |4.417879149610179 | 4.100910462032259 | 5.5520531519970655
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.019581855116755528 | 0.019652725721338006 | 0.020407515313740264
L_1 Model | 0.15945325456306342 | 0.15918409779511922 | 0.1638651051527742
L_inf Model |159.4532545630634 | 159.18409779511921 | 163.8651051527742
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.015142278335053005 | 0.016024649624925297 | 0.020676669278926123
L_1 Model |0.1291153352449778 | 0.1214319032992137 | 0.1723113738567438
L inf Model | 3.8734600573493347 | 3.642957098976411 | 5.169341215702314
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02037787938167375 | 0.020429517328455105 | 0.024006202983601076
L_1 Model |0.1615470882453407 | 0.16118465269610247 | 0.1774422284380188
L_inf Model | 161.5470882453407 | 161.18465269610246 | 177.4422284380188
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.016362755048176407 | 0.017546011575480306 | 0.018918371012604247
 L 1 Model | 0.14203823418901337 | 0.13593990336994316 | 0.1561397725101537
L inf Model |4.261147025670401 | 4.0781971010982945 | 4.684193175304611
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.019432087925893977 | 0.019488063518607657 | 0.02193693112399669
 L_1 Model | 0.15698298396298488 | 0.1567444097053316 | 0.16851314508138174
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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.013527900533876541 | 0.016314028469915587 | 0.015367107786566015
L_1 Model | 0.13778103261865168 | 0.12985367243409293 | 0.15120134705563568
L_inf Model |4.13343097855955 | 3.8956101730227877 | 4.53604041166907
Table: Different test losses for different models
 Model
         | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.01974273002640424 | 0.019764742726281165 | 0.02244681796181545
L_1 Model | 0.15840756841798964 | 0.15826224782023035 | 0.16734664826496917
L_inf Model | 158.40756841798964 | 158.26224782023036 | 167.34664826496916
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.017329667349628826 | 0.01827908359260939 | 0.0233331785416344456
 L_1 Model | 0.1360414504604143 | 0.13141162577753873 | 0.17333293523015064
L_inf Model |4.081243513812429 | 3.942348773326162 | 5.19998805690452
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.018911580669392993 | 0.018968582440108465 | 0.021693228389465843
 L 1 Model | 0.15430817193116925 | 0.15399863528142896 | 0.16541886430406674
L inf Model | 154.30817193116926 | 153.99863528142896 | 165.41886430406674
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.018065773363269675 | 0.023836068160838917 | 0.02175465803170375
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L 1 Model | 0.15410306845227023 | 0.13269114814741748 | 0.17953911697787242
L_inf Model |4.623092053568107 | 3.9807344444225246 | 5.386173509336173
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.019210289324323428 | 0.019229290137182543 | 0.021620044224097343
L_1 Model | 0.1541298104902452 | 0.15403715556870456 | 0.16328457184107978
L_inf Model | 154.1298104902452 | 154.03715556870458 | 163.28457184107978
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L 2 Model | 0.010955079040904132 | 0.012087418061012207 | 0.013953989689533824
L_1 Model | 0.12116968644408803 | 0.11111322812268538 | 0.13643245781459754
L inf Model |3.6350905933226407 | 3.3333968436805614 | 4.092973734437926
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model | 0.020879712894578857 | 0.020897541168548663 | 0.021918805237831226
L_1 Model | 0.16219608515459433 | 0.16215730282258986 | 0.16638569119627766
L_inf Model | 162.19608515459433 | 162.15730282258986 | 166.38569119627766
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.02413419926660108 | 0.02713641729963268 | 0.038006551331576086
 L 1 Model | 0.16447772313655687 | 0.15984272310192954 | 0.2301055912439382
L inf Model | 4.934331694096706 | 4.795281693057886 | 6.903167737318146
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
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```
L 2 Model | 0.01973481694573114 | 0.019789920356076646 | 0.02392646978576763
L_1 Model |0.1593839575105546 | 0.15917578998180562 | 0.1739338521700883
L inf Model | 159.38395751055458 | 159.17578998180562 | 173.9338521700883
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.017285262633502736 | 0.020103267701723042 | 0.019352324340646508
L_1 Model | 0.15573737342537144 | 0.14950408825509684 | 0.169306217701957
L_inf Model |4.672121202761144 | 4.485122647652905 | 5.07918653105871
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L 2 Model | 0.020649829177498226 | 0.020699132840563385 | 0.022965511612375613
 L 1 Model | 0.16129086984669688 | 0.16108754099253111 | 0.1717141522387046
L_inf Model | 161.2908698466969 | 161.0875409925311 | 171.7141522387046
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.011951205192693727 | 0.01332473435416138 | 0.013112337289141785
L 1 Model | 0.1267929785629277 | 0.11987938548873471 | 0.1384828467523744
L inf Model |3.803789356887831 | 3.596381564662041 | 4.1544854025712326
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02095718852128461 | 0.021007454703398615 | 0.02427289822921936
 L 1 Model | 0.16431753955228207 | 0.1641597132773084 | 0.17651457262661066
L_inf Model | 164.31753955228206 | 164.1597132773084 | 176.51457262661066
```

Table: Different training losses for different models

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Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.012802181297566726 | 0.01565872241117478 | 0.015945268529325908
 L 1 Model | 0.13227408224332096 | 0.12604004044783015 | 0.15160663047754072
L_inf Model |3.968222467299629 | 3.7812012134349047 | 4.548198914326222
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.019897018078976654 | 0.019947353125676817 | 0.02334021393730012
L_1 Model | 0.15926385096916276 | 0.1590130445504282 | 0.17220847022481703
L inf Model | 159.26385096916277 | 159.0130445504282 | 172.20847022481703
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.011998827749818976 | 0.012655207021677857 | 0.013854346256913511
L_1 Model | 0.12267503471729185 | 0.11832123894379477 | 0.13116768073388843
L inf Model |3.6802510415187557 | 3.549637168313843 | 3.935030422016653
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.020726168762113875 | 0.020841492290756228 | 0.02578484836591248
L 1 Model | 0.16394945872625866 | 0.16353963302973848 | 0.1836587884367355
L inf Model | 163.94945872625865 | 163.53963302973847 | 183.6587884367355
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.014682774735602205 | 0.015305492138244475 | 0.0199056024233583
 L 1 Model | 0.13122822073980817 | 0.1264320627812644 | 0.169396653519
L inf Model |3.9368466221942446 | 3.792961883437932 | 5.081899605569999
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.01923676055495136 | 0.01932230558485573 | 0.022608050856021467
L_1 Model | 0.1591989502124915 | 0.15885934311366687 | 0.17211994379488457
L inf Model | 159.1989502124915 | 158.85934311366688 | 172.11994379488456
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.025205021105789968 | 0.026142179461571335 | 0.02730418095417095
L 1 Model | 0.18047562955679822 | 0.17296765113552642 | 0.200585108531473
L_inf Model |5.414268886703947 | 5.189029534065793 | 6.01755325594419
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L_2 Model | 0.01959579689594081 | 0.019644920476908436 | 0.022805089237441827
 L 1 Model |0.1571242257654945 | 0.15685798723142627 | 0.17012814994296294
L_inf Model | 157.12422576549451 | 156.85798723142628 | 170.12814994296295
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.01513099192632439 | 0.01617780537166983 | 0.019352457996298845
 L 1 Model | 0.1415798029613482 | 0.13568234291855905 | 0.17559976134126504
L inf Model |4.247394088840446 | 4.0704702875567715 | 5.267992840237951
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.021219509406255225 | 0.021260214296801565 | 0.026767345066218286
 L_1 Model | 0.1622021353765534 | 0.1620312342289163 | 0.18336670019700405
L_inf Model |162.2021353765534 | 162.0312342289163 | 183.36670019700404
```

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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.009924245822362539 | 0.011738650823488307 | 0.013375915313151255
L_1 Model | 0.11628713536101044 | 0.10889983247754288 | 0.13929304298798015
L_inf Model | 3.4886140608303133 | 3.2669949743262863 | 4.178791289639404
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.02136743412476164 | 0.02149674902032545 | 0.02508195487182669
L_1 Model |0.1634146559150387 | 0.1629548866173102 | 0.1785591515348317
L inf Model | 163.4146559150387 | 162.9548866173102 | 178.5591515348317
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.013051520924531738 | 0.01602569002487886 | 0.021229308419666706
L_1 Model | 0.12255708244003279 | 0.11094635405417116 | 0.17506688472448004
L_inf Model |3.6767124732009835 | 3.328390621625135 | 5.252006541734401
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.021680098303547248 | 0.0217313936226797 | 0.02288702745647245
 L 1 Model | 0.16839334563239403 | 0.16820721397952385 | 0.1724605472268547
L inf Model | 168.39334563239402 | 168.20721397952386 | 172.4605472268547
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.015230585533031112 | 0.016052676130737922 | 0.03383360129465273
 L_1 Model | 0.12540665770686232 | 0.11868313065667424 | 0.23412016891482187
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.020597791373749237 | 0.020660041573519007 | 0.025976212650909984
L_1 Model | 0.16164353683965044 | 0.16145117085490335 | 0.18435071653876753
L_inf Model | 161.64353683965044 | 161.45117085490335 | 184.35071653876753
Table: Different training losses for different models
         | L 2 loss | L 2 loss | L inf loss
 Model
 L_2 Model |0.016912914897551132 | 0.020671372217000997 | 0.019026175586283153
L_1 Model | 0.14693597072225117 | 0.13786810510919562 | 0.16648746012627302
L_inf Model |4.4080791216675355 | 4.136043153275868 | 4.9946238037881905
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.019083270038514892 | 0.01915651955807651 | 0.021404688029841402
 L_1 Model | 0.1533905392845693 | 0.1530946491118694 | 0.16554520156759908
L_inf Model | 153.39053928456931 | 153.09464911186942 | 165.5452015675991
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.013723693906968672 | 0.014733303676033352 | 0.021763337603765386
 L 1 Model | 0.13427436299653678 | 0.13066550686980838 | 0.18476040986730563
L_inf Model |4.028230889896103 | 3.9199652060942514 | 5.542812296019169
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.020637932343063624 | 0.020733869639916788 | 0.024349830719806082
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L 1 Model | 0.16270619090524913 | 0.16243677266776463 | 0.17526312804618355
L_inf Model | 162.70619090524912 | 162.43677266776461 | 175.26312804618354
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.02319895475139062 | 0.02936023098548153 | 0.02479326314737297
L_1 Model |0.19158480808733186 | 0.18041977043144836 | 0.20032210357712238
L_inf Model |5.747544242619956 | 5.41259311294345 | 6.0096631073136715
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L 2 Model | 0.019627027350002317 | 0.019683061131496277 | 0.021026553634504536
L_1 Model | 0.15860899997735142 | 0.15836980866583567 | 0.16345478162425972
L inf Model | 158.60899997735143 | 158.36980866583568 | 163.4547816242597
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.011410710588638358 | 0.015110213818633948 | 0.01545689991408798
L_1 Model | 0.12080098786770023 | 0.10700541958516063 | 0.15395676968851682
L_inf Model |3.6240296360310067 | 3.210162587554819 | 4.618703090655504
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.018153310875722105 | 0.018203259867925634 | 0.019938233152866844
 L_1 Model |0.15291165409785656 | 0.15260801178150757 | 0.16001075254121408
L inf Model | 152.91165409785657 | 152.60801178150757 | 160.0107525412141
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
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L 2 Model | 0.012636556801984456 | 0.014506896179645363 | 0.01876420845278531
L_1 Model | 0.12448618488381642 | 0.11888972792721372 | 0.16478980512273483
L inf Model | 3.734585546514493 | 3.566691837816412 | 4.943694153682045
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.022061944503824392 | 0.022164257349278686 | 0.0247253777954714
L_1 Model |0.1688492124037648 | 0.16842098316367865 | 0.17963839325236963
L_inf Model | 168.8492124037648 | 168.42098316367864 | 179.63839325236964
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.016967733802976677 | 0.019577760567786547 | 0.023171660350710666
 L 1 Model |0.1490197832347463 | 0.13867623669275375 | 0.19298057129470897
L_inf Model |4.470593497042389 | 4.160287100782613 | 5.789417138841269
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.020115628507160893 | 0.020140084938659108 | 0.023632742327445614
L_1 Model | 0.1579125518707904 | 0.15775343314777912 | 0.17313141738948154
L inf Model |157.9125518707904 | 157.75343314777913 | 173.13141738948153
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.018637390064418998 | 0.021042291771659748 | 0.025182362687570823
 L 1 Model | 0.1590142885920043 | 0.15370590982600987 | 0.18612234807784905
L_inf Model |4.770428657760129 | 4.611177294780296 | 5.583670442335472
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Table: Different test losses for different models

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Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.019680716133109587 | 0.019746743485291474 | 0.024701782885019487
 L 1 Model | 0.1592742440304859 | 0.15897048369332661 | 0.18010134734329367
L_inf Model |159.2742440304859 | 158.97048369332663 | 180.10134734329367
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.012988152693761542 | 0.015593325135829336 | 0.013326872353477303
L_1 Model | 0.1434568061636711 | 0.1372398314631275 | 0.14524948234389334
L inf Model |4.303704184910133 | 4.117194943893825 | 4.3574844703168
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.020477836388927084 | 0.02063394815464747 | 0.0213478937391193
L_1 Model | 0.16227711631526145 | 0.16183485780822743 | 0.16528481530461453
L inf Model | 162.27711631526145 | 161.83485780822744 | 165.28481530461454
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.011879801208010814 | 0.01337183175912941 | 0.01945320329340185
L 1 Model | 0.12585357568220518 | 0.11822617339245008 | 0.172036447992256
L inf Model | 3.7756072704661556 | 3.546785201773502 | 5.16109343976768
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.02013326826932213 | 0.020159561424765524 | 0.022267258961798864
 L 1 Model | 0.16084066133831382 | 0.1606777529168794 | 0.16967190043696675
L inf Model | 160.84066133831382 | 160.6777529168794 | 169.67190043696675
```

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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.018296771643987894 | 0.021317833025841025 | 0.02132971396681544
L_1 Model | 0.1547039153023414 | 0.1434282367797971 | 0.17974013231250632
L_inf Model |4.641117459070242 | 4.302847103393913 | 5.392203969375189
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.01894547959831914 | 0.01902809815558252 | 0.02212946076990061
L 1 Model | 0.15528680084316898 | 0.15511074985085 | 0.16831689049167156
L_inf Model |155.28680084316898 | 155.11074985085 | 168.31689049167156
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.02066032646986726 | 0.024334296173379715 | 0.022335301146537763
 L_1 Model | 0.1671250979907497 | 0.16497685003423096 | 0.17363311687603616
L_inf Model |5.013752939722491 | 4.949305501026929 | 5.208993506281085
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.021155537290622375 | 0.021265889334404455 | 0.024629826097550427
 L 1 Model | 0.16356201648602364 | 0.16311009800957385 | 0.17679917080301347
L inf Model | 163.56201648602365 | 163.11009800957385 | 176.79917080301345
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02051850469557437 | 0.02306682737292338 | 0.03192851601058286
 L 1 Model |0.1507086325707789 | 0.14570108202552137 | 0.21811418238640357
L_inf Model |4.5212589771233676 | 4.371032460765641 | 6.543425471592107
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.01976920943330998 | 0.019828880270717112 | 0.02264172361849981
L_1 Model | 0.16075489820430164 | 0.16046211865176413 | 0.17278662194509076
L_inf Model | 160.75489820430164 | 160.46211865176414 | 172.78662194509076
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.01971487781403823 | 0.021206323173935393 | 0.023113946279782478
L_1 Model | 0.15802948804334732 | 0.14931907324644253 | 0.17308048488809796
L inf Model | 4.740884641300419 | 4.479572197393276 | 5.192414546642939
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.01933785964906126 | 0.019389728096225085 | 0.022677934182296983
L_1 Model | 0.156371763798297 | 0.15616114452747654 | 0.16996812096714123
L_inf Model |156.371763798297 | 156.16114452747652 | 169.96812096714123
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L_2 Model |0.0145004432522264 | 0.01646433729880497 | 0.018712187720127074
 L 1 Model | 0.14702517004066962 | 0.13478136200573754 | 0.17409058913425465
L_inf Model |4.410755101220088 | 4.043440860172126 | 5.222717674027639
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.019159104022239703 | 0.019285903154970675 | 0.024097402509328198
 L_1 Model |0.1576601545253367 | 0.1573227482638951 | 0.17698529835821453
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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.015549001374093903 | 0.017218333812258922 | 0.024458986107272398
L_1 Model |0.14168187813249034 | 0.13005761318228043 | 0.1819932680647362
L_inf Model |4.25045634397471 | 3.9017283954684125 | 5.459798041942086
Table: Different test losses for different models
         | L 2 loss | L 2 loss | L inf loss
 Model
 L_2 Model |0.01978805571349212 | 0.01982421027306172 | 0.02808710289110733
L_1 Model | 0.15862192997818914 | 0.1584895842980625 | 0.19043530962826097
L_inf Model | 158.62192997818914 | 158.4895842980625 | 190.43530962826097
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.014410545759534031 | 0.015495737351051768 | 0.020852100296210728
 L_1 Model |0.12384816807912209 | 0.11903248749243237 | 0.18165437623219116
L_inf Model |3.7154450423736627 | 3.570974624772971 | 5.449631286965735
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.01945309185050201 | 0.019515409445183044 | 0.024855681606709347
 L 1 Model | 0.15518292737095737 | 0.15495519607483457 | 0.17722363725888016
L inf Model |155.18292737095737 | 154.95519607483456 | 177.22363725888016
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.015234116018721811 | 0.01633614457737872 | 0.016986924183464414
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L 1 Model | 0.14363479807085908 | 0.1374107008373534 | 0.16429025918692877
L_inf Model |4.309043942125772 | 4.122321025120602 | 4.928707775607863
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.020000682103627227 | 0.02004324689409589 | 0.0268070836012368
L_1 Model | 0.15668775574763014 | 0.15646625530235428 | 0.1840648143232776
L_inf Model | 156.68775574763015 | 156.46625530235428 | 184.0648143232776
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L 2 Model | 0.019249776851256957 | 0.02167582121243036 | 0.025188801011301186
L_1 Model |0.16556864191358972 | 0.15127446670084208 | 0.1932580959557986
L inf Model |4.9670592574076915 | 4.538234001025263 | 5.797742878673958
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.01982829275497404 | 0.019866691423215725 | 0.02551107359836104
L_1 Model | 0.1585079989632902 | 0.15831769573726495 | 0.1797486251738897
L inf Model | 158.50799896329022 | 158.31769573726496 | 179.7486251738897
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.015218662733003313 | 0.015999915720463928 | 0.018835981452782695
 L 1 Model | 0.13428287507717032 | 0.12934973954728618 | 0.15878097153284976
L_inf Model |4.028486252315109 | 3.8804921864185857 | 4.7634291459854925
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
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L 2 Model | 0.018607674899405492 | 0.018624462349836543 | 0.020678636803419657
L_1 Model | 0.15408312752441697 | 0.15404428706066228 | 0.162040911228006
L inf Model | 154.08312752441697 | 154.04428706066227 | 162.04091122800602
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.021702338092502608 | 0.02522234758578412 | 0.025396990583067606
L_1 Model | 0.17743721212872085 | 0.1629406438358205 | 0.19206896537832824
L_inf Model |5.323116363861626 | 4.888219315074615 | 5.762068961349847
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.019924465484705584 | 0.019962291226136415 | 0.023853144853818634
 L 1 Model | 0.15987780165587095 | 0.1597237093670153 | 0.17430520531113206
L_inf Model |159.87780165587097 | 159.7237093670153 | 174.30520531113206
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.017892213025391103 | 0.020047791983506726 | 0.023729916993718497
 L_1 Model | 0.14878906086972316 | 0.13437533159533005 | 0.18782336573996006
L inf Model |4.463671826091694 | 4.031259947859901 | 5.634700972198802
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.019132688309802838 | 0.019302820294533566 | 0.021254737962056836
 L 1 Model | 0.15599694479977202 | 0.15542263916321056 | 0.16471498652256122
L inf Model | 155.99694479977202 | 155.42263916321056 | 164.71498652256122
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Table: Different training losses for different models

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Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02189545216184751 | 0.023705101866113472 | 0.023506814507597472
 L 1 Model | 0.1783002330026714 | 0.1730450296060498 | 0.18895614164347913
L_inf Model |5.349006990080142 | 5.1913508881814945 | 5.668684249304373
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02022110723888837 | 0.020274556470250574 | 0.024505509442443292
L_1 Model | 0.15931087222949078 | 0.15913433910142907 | 0.17737765430340338
L inf Model | 159.31087222949077 | 159.13433910142908 | 177.37765430340338
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.016665087011594526 | 0.01933734693959089 | 0.01930133246763229
L 1 Model | 0.1532581739575972 | 0.14125202946408452 | 0.16906410099365962
L inf Model |4.5977452187279155 | 4.237560883922535 | 5.071923029809788
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.0198981819563136 | 0.019922062503307768 | 0.020572788016541825
L 1 Model | 0.16090172812631803 | 0.16081184684892522 | 0.16422548696773043
L inf Model | 160.90172812631803 | 160.81184684892523 | 164.22548696773043
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.018395087415808746 | 0.02176688924929463 | 0.021597770472362863
 L 1 Model | 0.15595083731971174 | 0.14376913734199662 | 0.17554148143558965
L inf Model | 4.678525119591352 | 4.313074120259898 | 5.26624444306769
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model | 0.020641845406021524 | 0.02068901263944924 | 0.02184232729886155
L_1 Model | 0.1647432227737946 | 0.16460656518880476 | 0.1685235716956425
L_inf Model | 164.7432227737946 | 164.60656518880475 | 168.5235716956425
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.012463765521589542 | 0.013742905040100707 | 0.015855807473978484
L 1 Model | 0.12403834383115561 | 0.11323301946019972 | 0.15003387953989883
L_inf Model |3.7211503149346683 | 3.3969905838059913 | 4.501016386196965
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L_2 Model | 0.019078185554156083 | 0.019164912295524816 | 0.021939662808778786
 L 1 Model | 0.15600726506626225 | 0.15567449256151195 | 0.16715648319861773
L_inf Model | 156.00726506626225 | 155.67449256151195 | 167.15648319861774
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.024136397551685684 | 0.02755953862413715 | 0.038575476792060207
 L 1 Model | 0.16750427339777907 | 0.15249246662937938 | 0.25762900649696224
L inf Model |5.025128201933372 | 4.574773998881382 | 7.7288701949088665
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.019668229111727022 | 0.019720745091819487 | 0.022153345921301946
 L 1 Model | 0.1593903157133856 | 0.15912074048571315 | 0.16918243487799356
L_inf Model | 159.3903157133856 | 159.12074048571316 | 169.18243487799356
```

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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.010896438991670542 | 0.01149389722358705 | 0.012140990331455123
L_1 Model | 0.11951574395819056 | 0.11303512591503971 | 0.12992829230006786
L_inf Model |3.5854723187457167 | 3.3910537774511913 | 3.8978487690020356
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.019164619922347737 | 0.019218324316147357 | 0.023444084039323437
L_1 Model | 0.15564804883121258 | 0.15544472652253388 | 0.17445301787652118
L inf Model | 155.64804883121258 | 155.44472652253387 | 174.4530178765212
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.014999173860505633 | 0.01647441203271083 | 0.02166590352616552
L_1 Model | 0.12757990591697366 | 0.11743332040421967 | 0.17598088803740836
L_inf Model |3.8273971775092095 | 3.52299961212659 | 5.27942664112225
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.018563650161040182 | 0.018633414084809688 | 0.023152184398583495
 L 1 Model | 0.15464745391819743 | 0.1542141045081248 | 0.17292185045924205
L inf Model | 154.6474539181974 | 154.21410450812482 | 172.92185045924205
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.01743070839429687 | 0.021885416646320276 | 0.02402256618055198
 L_1 Model |0.14898417864205624 | 0.1328372487116067 | 0.18801090564331238
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.019910192740239946 | 0.019995633596891667 | 0.024341469932078988
L_1 Model | 0.1577792143595792 | 0.1574672422711603 | 0.17562882302227337
L_inf Model |157.7792143595792 | 157.4672422711603 | 175.62882302227337
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L_2 Model | 0.021631972299723946 | 0.02464361204457324 | 0.02858957597052702
L 1 Model | 0.16326686864077125 | 0.1532965805895999 | 0.20046277014773603
L_inf Model |4.898006059223137 | 4.598897417687997 | 6.013883104432081
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.017791906165024178 | 0.017816349176864737 | 0.018584144006080546
 L_1 Model |0.14720818847662584 | 0.1471002344147896 | 0.1504316314035534
L_inf Model | 147.20818847662585 | 147.10023441478958 | 150.43163140355338
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.007676487580082631 | 0.008539592707031533 | 0.011826462207424972
 L 1 Model | 0.09957918129959377 | 0.09304880532731487 | 0.1315207407040602
L_inf Model |2.987375438987813 | 2.791464159819446 | 3.9456222211218055
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.021283165150503693 | 0.021317520764528912 | 0.02346928204300176
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L 1 Model | 0.16493516394278585 | 0.1648177331264314 | 0.17346788350011652
L_inf Model | 164.93516394278583 | 164.8177331264314 | 173.46788350011653
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.018642587661358498 | 0.02001829309830958 | 0.024125806674729574
L_1 Model | 0.15567036086371305 | 0.1524182817878216 | 0.1927326475049339
L_inf Model |4.670110825911392 | 4.572548453634648 | 5.781979425148017
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L 2 Model | 0.020180799149149487 | 0.020320438857294496 | 0.022039922824541994
L_1 Model | 0.1628152895745409 | 0.16228214592026274 | 0.17120876553548878
L inf Model | 162.81528957454088 | 162.28214592026274 | 171.20876553548877
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.012865894449836377 | 0.014414279938540532 | 0.019452161055759195
L_1 Model | 0.13043305250188955 | 0.11795181328724133 | 0.17526897719371312
L inf Model |3.9129915750566866 | 3.53855439861724 | 5.258069315811394
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.02037042517126739 | 0.020465622769380725 | 0.021617497097444066
 L 1 Model | 0.16052964056666927 | 0.1602423983027416 | 0.1654438956850926
L inf Model | 160.52964056666926 | 160.24239830274158 | 165.4438956850926
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
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L 2 Model | 0.010226737593526429 | 0.011075121017153458 | 0.013902433474798088
L_1 Model | 0.11486876252837201 | 0.11104785308596775 | 0.14340314471763035
L inf Model |3.4460628758511604 | 3.3314355925790324 | 4.30209434152891
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.018300592889112014 | 0.01835691405099676 | 0.018935504233077053
L_1 Model | 0.15358876627185897 | 0.15339675942591843 | 0.15676695656329848
L_inf Model | 153.58876627185896 | 153.39675942591845 | 156.76695656329846
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.009260912037011255 | 0.010280332864352879 | 0.015871585768407546
 L 1 Model | 0.10858292627414928 | 0.10498921020935302 | 0.15822525404900772
L_inf Model |3.2574877882244784 | 3.1496763062805906 | 4.746757621470231
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.018240168775122047 | 0.0182870257431411 | 0.02290368628885629
 L_1 Model | 0.1535094200814326 | 0.15326835949636258 | 0.17114399583432113
L inf Model | 153.50942008143258 | 153.2683594963626 | 171.14399583432115
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.02220277029661513 | 0.02584031645344972 | 0.0502212329603811
 L 1 Model | 0.15667850641528322 | 0.15169452169877265 | 0.27185727280698824
L_inf Model |4.700355192458496 | 4.5508356509631795 | 8.155718184209647
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Table: Different test losses for different models

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Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.01988313316528747 | 0.020027368616006104 | 0.02155888351241826
 L 1 Model | 0.1575542407929551 | 0.1571006272833868 | 0.1645588145400685
L_inf Model |157.5542407929551 | 157.1006272833868 | 164.55881454006848
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.014421472616411465 | 0.016977330338835004 | 0.019249631273132742
L_1 Model | 0.13547743877935195 | 0.12973967982026366 | 0.17153352374126118
L inf Model |4.064323163380559 | 3.8921903946079097 | 5.1460057122378355
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.02267065548708689 | 0.022808134040632134 | 0.024365055418285028
L_1 Model | 0.17062743818948659 | 0.17016398537839075 | 0.17696758756668993
L inf Model | 170.62743818948658 | 170.16398537839075 | 176.96758756668993
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.021215086344610765 | 0.030223260414757983 | 0.025197856811696347
L 1 Model | 0.1811874806866053 | 0.1735890516054824 | 0.1936347368094837
L inf Model | 5.43562442059816 | 5.207671548164472 | 5.8090421042845115
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.01847228128726503 | 0.018499607061679312 | 0.022132731362703963
 L 1 Model | 0.15475535736425494 | 0.15458744157437543 | 0.17040967563475884
L inf Model | 154.75535736425493 | 154.58744157437542 | 170.40967563475883
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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model | 0.018675642445324023 | 0.022799453976208896 | 0.021249237484277327
L_1 Model | 0.15840403778152898 | 0.14653847119027047 | 0.1783386597576561
L inf Model |4.752121133445869 | 4.396154135708114 | 5.3501597927296825
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.01973915612602359 | 0.01978525769133186 | 0.021245832115962135
L 1 Model | 0.15868821520551887 | 0.158453491326447 | 0.16555146851689076
L_inf Model | 158.68821520551887 | 158.45349132644702 | 165.55146851689076
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.02293251134122 | 0.025397594673272947 | 0.04027351889424092
 L_1 Model |0.16517167440591363 | 0.154894072032652 | 0.25290606895517576
L_inf Model |4.955150232177409 | 4.646822160979561 | 7.587182068655272
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.019262919498569283 | 0.019335053497993686 | 0.024852463405811466
 L 1 Model | 0.15669056895360495 | 0.156468068616311 | 0.17941513379774102
L inf Model | 156.69056895360495 | 156.468068616311 | 179.41513379774102
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.01325503741124588 | 0.015464410132610731 | 0.019444151845486705
 L 1 Model |0.12931153046540325 | 0.1140333515913906 | 0.17703899688388977
L_inf Model |3.8793459139620974 | 3.421000547741718 | 5.311169906516693
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.02093531043895335 | 0.020979305442617516 | 0.022591387398251693
L_1 Model | 0.1628642859246258 | 0.16255642121448385 | 0.17080883344149406
L_inf Model | 162.8642859246258 | 162.55642121448386 | 170.80883344149404
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.00731219014310136 | 0.008170934327541112 | 0.008280707490287352
L_1 Model | 0.10307037765003084 | 0.0955193656946656 | 0.11230224439893213
L inf Model |3.0921113295009253 | 2.865580970839968 | 3.369067331967964
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02019884426718423 | 0.02025993821346957 | 0.02235793158861904
L_1 Model | 0.16129303001282844 | 0.1610523580629436 | 0.16886848442409966
L_inf Model | 161.29303001282844 | 161.0523580629436 | 168.86848442409965
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.020260982026113556 | 0.028330768188348288 | 0.029569912276552663
 L 1 Model | 0.1492884416893378 | 0.1253787611597231 | 0.2082780713008079
L inf Model | 4.478653250680134 | 3.761362834791693 | 6.248342139024237
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.01956095135176804 | 0.019612467225806222 | 0.022908676182677615
 L_1 Model |0.1577077184100725 | 0.15742862351273054 | 0.17006363698262444
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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.01340753580099246 | 0.01598899975716276 | 0.02082383287608217
L_1 Model | 0.13778452945078418 | 0.12550148110449652 | 0.18151797303406053
L_inf Model |4.133535883523526 | 3.7650444331348956 | 5.445539191021816
Table: Different test losses for different models
         | L 2 loss | L 2 loss | L inf loss
 Model
 L_2 Model |0.0189337528611844 | 0.018976438518614292 | 0.02206798711003176
L_1 Model | 0.15514417631047098 | 0.1549863978124863 | 0.1686206397750051
L_inf Model |155.14417631047098 | 154.9863978124863 | 168.62063977500512
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.012575106315398061 | 0.013484720542825505 | 0.01448383674737769
 L_1 Model | 0.1342100108958772 | 0.12609891221409195 | 0.15235516443225358
L_inf Model |4.026300326876316 | 3.782967366422758 | 4.570654932967607
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model |0.019471325962201386 | 0.019548782311113642 | 0.022447593521861715
 L 1 Model | 0.15478938764824562 | 0.15442358001644338 | 0.16693458104740957
L_inf Model | 154.78938764824562 | 154.42358001644337 | 166.93458104740958
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.016453368497315594 | 0.017744454452130184 | 0.020173813620290398
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L 1 Model | 0.1488542319744318 | 0.14309015821585203 | 0.1745457024424775
L_inf Model |4.465626959232954 | 4.292704746475561 | 5.2363710732743245
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.01832766839189119 | 0.018381684700945474 | 0.019398262024238284
L_1 Model | 0.15256588653419376 | 0.15231940155604323 | 0.1580627267186584
L_inf Model | 152.56588653419377 | 152.31940155604323 | 158.0627267186584
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L 2 Model | 0.018326357430113686 | 0.019887402011460154 | 0.02445502267020485
L_1 Model | 0.1494618503182919 | 0.14279813978997694 | 0.18879570154670924
L inf Model |4.483855509548757 | 4.283944193699308 | 5.663871046401277
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.02058546048009225 | 0.02070300733107181 | 0.02985364372736991
L_1 Model | 0.16274790053546667 | 0.1622702667998228 | 0.1950208385206415
L_inf Model | 162.74790053546667 | 162.2702667998228 | 195.0208385206415
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.02232958705158429 | 0.02608763906815111 | 0.03355029236896926
 L 1 Model | 0.1729497377177192 | 0.165111628179511 | 0.22798980123630078
L inf Model | 5.188492131531576 | 4.95334884538533 | 6.839694037089023
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
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L 2 Model | 0.02036048342409574 | 0.020425728176678093 | 0.021708676170754306
L_1 Model | 0.16241458778577775 | 0.16203798789120744 | 0.1661627897229586
L inf Model | 162.41458778577774 | 162.03798789120742 | 166.1627897229586
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model | 0.015464924356253058 | 0.015672833934431286 | 0.020962212563825057
L_1 Model |0.13633425213403333 | 0.1335258292455894 | 0.18176351851834477
L_inf Model |4.090027564021 | 4.005774877367682 | 5.452905555550343
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L_2 Model | 0.018822352955328213 | 0.018858430736725842 | 0.021332442077822245
 L 1 Model | 0.15511659861247307 | 0.15484805979980745 | 0.16496505126033256
L_inf Model | 155.11659861247307 | 154.84805979980746 | 164.96505126033256
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.017142281333688322 | 0.018629269842613143 | 0.02256163620113681
L_1 Model |0.15205409714245827 | 0.14671784190795473 | 0.1905110211451346
L inf Model |4.561622914273748 | 4.401535257238642 | 5.715330634354038
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.020877138635673562 | 0.02096253500350962 | 0.024002585690544278
 L 1 Model | 0.16431975747381775 | 0.16395742400909197 | 0.1772519853945032
L inf Model | 164.31975747381776 | 163.95742400909197 | 177.2519853945032
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Table: Different training losses for different models

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Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.021221285142853288 | 0.02256200126571976 | 0.030872563895701036
 L_1 Model |0.15963315453181617 | 0.14898372448629285 | 0.20880224709718911
L_inf Model |4.788994635954485 | 4.469511734588785 | 6.264067412915673
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.019413705888568618 | 0.019452660625268233 | 0.021110059531041846
L_1 Model | 0.15580619547705224 | 0.15561469520600282 | 0.163214018161097
L inf Model | 155.80619547705223 | 155.61469520600284 | 163.21401816109702
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.009611052805368522 | 0.011957372041937801 | 0.010156503223820753
L_1 Model | 0.11677589092745601 | 0.1074277789294698 | 0.12016379485248795
L inf Model |3.50327672782368 | 3.222833367884094 | 3.6049138455746386
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model | 0.01874280927081187 | 0.018861036773991847 | 0.02283522174277905
L 1 Model | 0.15509670726406072 | 0.1547606285728827 | 0.1736731193769552
L inf Model | 155.0967072640607 | 154.7606285728827 | 173.6731193769552
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.01941765571628717 | 0.026106354664568118 | 0.021413583836105733
 L 1 Model | 0.16925702085922964 | 0.1534093925421335 | 0.18125751143425836
L inf Model | 5.07771062577689 | 4.602281776264006 | 5.437725343027751
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.021877849025272986 | 0.021910623231331527 | 0.025744459140189527
L_1 Model |0.16630039395472765 | 0.16611657920853506 | 0.1838071129723158
L_inf Model | 166.30039395472764 | 166.11657920853506 | 183.8071129723158
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.01820648675433529 | 0.019475301640558648 | 0.0199614121602102
L 1 Model | 0.13900983648183546 | 0.13267048369846793 | 0.14937896612859358
L_inf Model |4.170295094455064 | 3.9801145109540377 | 4.4813689838578075
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L_2 Model |0.01998291713682894 | 0.0200305126997382 | 0.025115659143989843
 L_1 Model | 0.15946625027343106 | 0.15929428406880947 | 0.17929760357975547
L_inf Model | 159.46625027343106 | 159.29428406880947 | 179.29760357975547
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.018450985689664766 | 0.02087267649093504 | 0.020250731975862378
 L 1 Model | 0.1571344779481045 | 0.15245249193865174 | 0.16365067773261666
L inf Model |4.714034338443136 | 4.573574758159552 | 4.9095203319784995
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.020546212458750567 | 0.020611762462718862 | 0.022710315086175166
 L_1 Model |0.16347898054210772 | 0.1632613760823652 | 0.1723273707717182
L_inf Model | 163.4789805421077 | 163.26137608236522 | 172.3273707717182
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Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.012538260998224924 | 0.013895753748328264 | 0.015483867542945753
L_1 Model | 0.11798899370380368 | 0.10929116951202014 | 0.14213990332185902
L_inf Model |3.5396698111141105 | 3.278735085360604 | 4.264197099655771
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.020644562033257416 | 0.020744167613941007 | 0.024420418653756364
L_1 Model | 0.16224740281800512 | 0.16191510198551226 | 0.1773493558883998
L inf Model | 162.24740281800513 | 161.91510198551225 | 177.3493558883998
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.014883050848255376 | 0.017535087698325773 | 0.016990602094114553
L_1 Model | 0.14722864470045113 | 0.14203253923304604 | 0.15837830514427959
L_inf Model |4.416859341013534 | 4.260976176991381 | 4.751349154328388
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L_2 Model | 0.020099003711389618 | 0.020196375013712818 | 0.022034123636716002
 L 1 Model | 0.16272194869271706 | 0.1624966577191577 | 0.16967216137353625
L inf Model | 162.72194869271706 | 162.4966577191577 | 169.67216137353626
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.0136741696460227 | 0.01471764930070211 | 0.01712761555472535
 L_1 Model |0.13781504559071364 | 0.13326260289213862 | 0.15996108778287324
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Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.019633634041891754 | 0.019699209867904837 | 0.022072202249733375
L_1 Model | 0.1584848456998949 | 0.15828531303866655 | 0.17049934711065798
L_inf Model | 158.48484569989492 | 158.28531303866654 | 170.49934711065796
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L_2 Model |0.012617784579312749 | 0.014634409479186823 | 0.015955675183031877
L 1 Model | 0.13545522653070446 | 0.12416364927752394 | 0.157196208014388
L_inf Model |4.063656795921134 | 3.724909478325718 | 4.71588624043164
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.021161847293423974 | 0.021214443359054737 | 0.03144216725400376
 L_1 Model | 0.16318352084404883 | 0.16292907513451618 | 0.2009338669405303
L_inf Model | 163.18352084404884 | 162.92907513451618 | 200.93386694053032
Table: Different training losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.01121163616597836 | 0.011956096584437192 | 0.014450725333954794
 L 1 Model | 0.12182601411781875 | 0.11368820529382803 | 0.1457801954867022
L inf Model |3.6547804235345627 | 3.410646158814841 | 4.373405864601066
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.022285461649996674 | 0.022318869321018616 | 0.027674151288457717
```

```
L 1 Model | 0.16646826389307173 | 0.16629088731401998 | 0.19087537906643134
L_inf Model | 166.46826389307174 | 166.29088731401998 | 190.87537906643135
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.024255218524903328 | 0.028876679324237924 | 0.03269146238872828
L_1 Model | 0.18132797820556104 | 0.16116862965291773 | 0.22144725297570889
L_inf Model |5.439839346166831 | 4.835058889587532 | 6.643417589271267
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
L 2 Model | 0.01926795694083163 | 0.01934980466560897 | 0.030007287983810974
L_1 Model | 0.15617838831543523 | 0.15583534462550094 | 0.19751518601072132
L inf Model | 156.17838831543523 | 155.83534462550094 | 197.51518601072132
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.01642407941390444 | 0.01925072510977266 | 0.018515770228463558
L_1 Model | 0.15483367644250573 | 0.1482198068239102 | 0.1771632520842692
L_inf Model |4.645010293275172 | 4.446594204717306 | 5.314897562528076
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.019539903232658286 | 0.01955678099833178 | 0.02223026953356725
 L 1 Model | 0.15461631475725443 | 0.1545372285219442 | 0.16558206842677872
L inf Model | 154.61631475725443 | 154.5372285219442 | 165.58206842677873
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
```

```
L 2 Model | 0.016025211771295716 | 0.018334721101934136 | 0.021889805412379417
L_1 Model | 0.1503219529777137 | 0.13853659566944412 | 0.19133045407385774
L inf Model |4.509658589331411 | 4.1560978700833235 | 5.739913622215732
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.020929762385419957 | 0.020975577966051342 | 0.02332256032391784
L_1 Model | 0.16463303084717876 | 0.16438821190898673 | 0.17482670808916292
L_inf Model | 164.63303084717876 | 164.38821190898673 | 174.82670808916293
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model | 0.015394597456514674 | 0.0178460426789773 | 0.017624100138851077
 L 1 Model | 0.1450437320294986 | 0.13437730447460156 | 0.16559210234006785
L_inf Model |4.351311960884958 | 4.031319134238046 | 4.967763070202036
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.02011536694157592 | 0.02013040397831599 | 0.021389403941831073
 L 1 Model | 0.1595135409558534 | 0.15942949345067664 | 0.1644217043398826
L inf Model |159.51354095585341 | 159.42949345067663 | 164.4217043398826
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.014212430783113985 | 0.018607694331048488 | 0.02102614307949245
 L 1 Model | 0.13845517509548974 | 0.12661791169980274 | 0.18676048818191818
L_inf Model |4.153655252864692 | 3.7985373509940823 | 5.602814645457546
```

Table: Different test losses for different models

```
Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model | 0.019487957757413896 | 0.019587542139139952 | 0.023490403613730115
 L 1 Model | 0.15421246003999886 | 0.15383892735793964 | 0.17223159029975987
L_inf Model | 154.21246003999886 | 153.83892735793964 | 172.2315902997599
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
L_2 Model |0.020257043417988882 | 0.022506615752218427 | 0.0221413343321421
L_1 Model |0.16807247500780223 | 0.15757741660607477 | 0.17897020973821143
L inf Model |5.0421742502340665 | 4.727322498182243 | 5.369106292146343
Table: Different test losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L 2 Model |0.02000316044272387 | 0.020017756301345658 | 0.028595818027440222
L_1 Model | 0.15751410287189047 | 0.15739369537646766 | 0.1907444525806079
L inf Model | 157.51410287189046 | 157.39369537646766 | 190.7444525806079
Table: Different training losses for different models
 Model | L_2 loss | L_2 loss | L_inf loss
 L_2 Model |0.015319153784914408 | 0.016511243401664433 | 0.02170489548230377
L 1 Model | 0.12748815477375872 | 0.11982831693335408 | 0.16703901854832484
L inf Model | 3.8246446432127614 | 3.5948495080006224 | 5.011170556449745
Table: Different test losses for different models
 Model | L 2 loss | L 2 loss | L inf loss
 L 2 Model | 0.020681091247583164 | 0.020788298340718575 | 0.02363020606328643
 L_1 Model |0.16382165989881442 | 0.16355250844388874 | 0.1758101816371747
L inf Model | 163.82165989881443 | 163.55250844388874 | 175.8101816371747
```

Table: Different training losses for different models

```
Model | L_2 loss | L_2 loss | L_inf loss

L_2 Model | 0.01172373047121488 | 0.01296918189487667 | 0.02022248294213947

L_1 Model | 0.12133830889560228 | 0.11791427160145775 | 0.17715897624559848

L inf Model | 3.640149266868068 | 3.537428148043732 | 5.314769287367954
```

Table: Different test losses for different models

```
Model | L_2 loss | L_2 loss | L_inf loss

L_2 Model | 0.02041044688464786 | 0.020456250711245783 | 0.026553992242393767

L_1 Model | 0.16101776823280192 | 0.16086314626903786 | 0.18451582220849053

L_inf Model | 161.01776823280193 | 160.86314626903786 | 184.51582220849053

1e)
```

What I seen in the tables is that I realized that the difference in the training and test losses tables are that the test table have more larger values than in the training table. This is because in the test table we are generating a lot more test data points which causes our model to be more accurate. Also, in the L_inf model, the values are higher than in the other models. It is because L_inf norm is going off the maximum value, making it more normal for it to be high. It is influence by the magnitude of the highest value, so outliers very easily cause it to diverge.

2d)

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 1.5887073208488474 | 1 | 9.685454059110057e+110 | 0.1 | -8.544383053831851e+104
- 50 | 6.681187863472287e+78 | 2 | 8.264222796482778e+103 | 1.0 | 2.710698337871812e+209
- 100 | 1.3264423843113885e+108 | 4 | 1.399214959758374e+108 | 10.0 | nan
- 200 | 9.257088690786201e+145 | 8 | -1.115438668225958e+103 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

- 10 | 3.5398926683963936e+210 | 1 | 3.874201127686805e+217 | 0.1 | -2.3995542115574723e+214
- 50 |-6.092265290698519e+211 | 2 | 2.4318346396293315e+214 | 1.0 | nan

```
100 | 6.531618010146513e+210 | 4 | 1.052244909446209e+211 | 10.0 | nan
200 | 7.849208802619096e+218 | 8 | -2.7914629345974663e+208 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-3318337365.0413804 | 1 |3.166171798797541e+108 | 0.1 |4.508780977663195e+109

50 |2.7797360116551276e+77 | 2 |3.607196350170701e+113 | 1.0 |1.3575235219470153e+204

100 |-7.336865284021071e+107 | 4 |-7.02001164203185e+104 | 10.0 |7.71688856270352e+305

200 |-5.48717545945836e+141 | 8 |1.8614665094700543e+106 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |3.980400111873265e+210 | 1 |-1.2355647798273682e+221 | 0.1 |2.5293258269495735e+214

50 |2.366454113395718e+211 | 2 |5.505183994251537e+213 | 1.0 | nan

100 |9.808201183776644e+213 | 4 |1.2861791272388231e+211 | 10.0 | nan

200 |4.936166010965149e+218 | 8 |-2.4592667474051196e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2893601962.2312965 | 1 |1.1794132549973481e+111 | 0.1 |2.2901452273076475e+113

50 |-3.705764488902992e+85 | 2 |-7.795352480019006e+110 | 1.0 |1.1571776433939313e+205

100 |-5.3891732936010125e+107 | 4 |-1.0515009578453442e+108 | 10.0 | nan

200 |-8.980355782685844e+136 | 8 |1.7423283717480669e+109 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1.0171551261277492e+208 | 1 |2.9305768985817667e+217 | 0.1 |1.1961328084877877e+213

50 |6.375877122642293e+211 | 2 |3.68075236621739e+213 | 1.0 |nan

100 |5.797072998795849e+212 | 4 |-1.2187543236836965e+212 | 10.0 |nan

```
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 107392.49930268108 | 1 | 2.023251110142703e+114 | 0.1 | -3.0315126380895086e+111
50 |8.038428206286163e+76 | 2 |1.9257604389927175e+110 | 1.0 |-1.929502896009264e+213
100 | 3.6429957695797507e+108 | 4 | 1.3828508737098547e+107 | 10.0 | nan
200 |-1.2886023254284662e+135 | 8 | 1.3486832206866585e+106 | 100.0 | nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |-2.0864123594224526e+209 | 1 |5.923967675270361e+218 | 0.1 |-2.647238793252183e+214
50 | 9.214106087317534e+211 | 2 | 2.8130425159078393e+215 | 1.0 | nan
100 |-3.0975112776816678e+212 | 4 | 1.6044731437039901e+211 | 10.0 | nan
200 |3.8370717189394284e+216 | 8 |3.198155354712311e+207 | 100.0 |nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 0.8806395024314195 | 1 | 5.62337913758968e+114 | 0.1 | | 3.451683832318016e+103
50 |1.1263503627056595e+82 | 2 |-2.572769313820822e+110 | 1.0 | 7.052244394804065e+214
100 | 1.206663493917033e+116 | 4 | -3.9728119054783846e+100 | 10.0 | 2.820695859868985e+307
200 |-1.9418084651194348e+142 | 8 | 3.535002289781789e+106 | 100.0 | nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |-7.849990509766216e+208 | 1 |-2.6863715107312336e+219 | 0.1 |5.285532934298051e+214
50 |-1.5137229109368103e+211 | 2 |-3.768247995947978e+215 | 1.0 | nan
100 |1.4880774603231338e+212 | 4 |2.650023365220947e+210 | 10.0 |nan
```

200 |2.2801852272284108e+216 | 8 |3.4594232544168816e+207 | 100.0 |nan

```
Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 7169186344.458417 | 1 | 8.648674473840346e+112 | 0.1 | 4.121593375930555e+107

50 | 1.8406326897815568e+86 | 2 | -5.136207851112755e+109 | 1.0 | 2.2931719964554517e+210

100 | 3.0911635444732773e+114 | 4 | 7.732866276359234e+100 | 10.0 | nan

200 | 7.360918496594647e+141 | 8 | 1.8549240146478945e+104 | 100.0 | nan
```

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-7.265877925408103e+207 | 1 |1.5448797152692444e+220 | 0.1 |2.958408790538185e+215

50 |8.854418333435177e+211 | 2 |1.6531413354282244e+213 | 1.0 |nan

100 |1.1871220490486944e+215 | 4 |2.790184303947682e+211 | 10.0 |nan

200 |1.7962305817881252e+220 | 8 |7.346571867308058e+208 | 100.0 |nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 16831699355387.305 | 1 | 2.1904248402060403e+115 | 0.1 | 1.1644055635502312e+108

50 | 3.6603538849979154e+76 | 2 | -1.6624087513223502e+110 | 1.0 | 9.70667384054138e+202

100 | 1.3330069335761428e+107 | 4 | 3.115565636912145e+107 | 10.0 | nan

200 | 7.69222027054193e+141 | 8 | -5.2427165324156814e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.051046737928901e+211 | 1 |4.9065539887242374e+219 | 0.1 |-1.653656851678039e+213

50 |-5.654124985922029e+210 | 2 |7.350139682038665e+211 | 1.0 | nan

100 |-1.4863750228315118e+214 | 4 |5.1191269277506893e+210 | 10.0 | nan

200 |-2.389906198734426e+218 | 8 |-4.4050371417359185e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |604311584.5062443 | 1 |4.765646026329451e+108 | 0.1 |1.6342563739725154e+113

50 |1.4002301159201677e+79 | 2 |1.74064274492961e+107 | 1.0 |7.290943358391204e+206

100 |5.263067743185593e+102 | 4 |6.070961962595482e+109 | 10.0 |nan

200 |2.7991295952958515e+139 | 8 |-8.091620930121673e+101 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |9.11299713820462e+210 | 1 |3.128123255128227e+216 | 0.1 |-6.016825260606337e+213

50 |-1.5177524259339362e+212 | 2 |1.0302360944691367e+216 | 1.0 | nan

100 |-7.262099196146719e+213 | 4 |9.751703706378137e+210 | 10.0 |nan 200 |-9.134196693946885e+218 | 8 |-4.851825641379698e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.9213669396576416 | 1 |1.0889921853777e+109 | 0.1 |4.193558815286653e+111

50 |-3.797729510521591e+78 | 2 |4.152797683150825e+109 | 1.0 |1.222285595272223e+209

100 |1.9350171191799553e+103 | 4 |2.0626817998779343e+104 | 10.0 |8.775151258826349e+304

200 |-1.297090743320634e+147 | 8 |-6.915344458132493e+101 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.9345517841500225e+208 | 1 | 4.024223352144386e+218 | 0.1 | 8.675006463806541e+213

50 | 3.1838202208019717e+211 | 2 | 2.9888995951769885e+214 | 1.0 | nan

100 | 8.402143598777942e+212 | 4 | 6.853861329494663e+209 | 10.0 | nan

200 | 7.989022062043416e+215 | 8 | 6.107049126319675e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1.2158129084230158e+37 | 1 |-1.4588951973536691e+121 | 0.1 | 2.713803304589833e+109

50 |-9.503662539638893e+75 | 2 |9.279016782561824e+113 | 1.0 | 1.5040388982981859e+208

100 |1.586212234542708e+106 | 4 |3.7236351656455037e+105 | 10.0 | nan

200 |1.361740270081602e+144 | 8 |1.0967412564621194e+103 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.4570704920739101e+209 | 1 |2.307302537484164e+217 | 0.1 |-1.2564702067557648e+215

50 |1.284207519250175e+211 | 2 |5.3535119797824e+213 | 1.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 369.30154935034744 | 1 | 2.2929618409431954e+114 | 0.1 | -6.8678779097729604e+112
- 50 |-1.4600620926110207e+90 | 2 |3.2441951084455915e+112 | 1.0 |6.0218615505159605e+208
- 100 | 4.056319748890233e+113 | 4 | -4.91576298143231e+110 | 10.0 | 7.128723296597454e+300
- 200 | 7.343582558530846e+136 | 8 | 3.0773573560178103e+103 | 100.0 | nan

100 | 6.735949987892597e+213 | 4 | -3.378422757447662e+210 | 10.0 | nan

200 |3.231816463011576e+218 | 8 |3.4776581412881606e+207 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 3.0553463482842495e+209 | 1 | 5.727152937708778e+217 | 0.1 | 7.242680421504799e+211
- 50 | 1.791273588533185e+209 | 2 | 6.698400772240744e+216 | 1.0 | nan
- 100 | 2.637888973470054e+214 | 4 | 5.362010610364563e+212 | 10.0 | nan
- 200 |1.0062654705439546e+217 | 8 |4.51422202693039e+206 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

```
10 |-6.613615170608433e+16 | 1 |3.636108310071247e+107 | 0.1 |1.3228798845283705e+108
```

- 50 | 7.825675471999792e+86 | 2 | -7.907676858694154e+111 | 1.0 | 1.5717353742435615e+210
- 100 |-1.0231438174019459e+109 | 4 |1.8902635794979782e+107 | 10.0 |nan
- 200 |8.673341591101821e+138 | 8 |3.908486745465365e+101 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 |1.7218360130071745e+212 | 1 |1.7486954899078707e+217 | 0.1 |9.130514752784957e+215
- 50 |1.109247365412263e+208 | 2 |5.675071366886216e+214 | 1.0 |nan
- 100 | 2.7405801781388564e+212 | 4 | -2.857043007404294e+210 | 10.0 | nan
- 200 |2.2322209828721466e+219 | 8 |5.834405576790464e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 93765.50874636958 | 1 | 5.591623561240852e+115 | 0.1 | 1.8665036772152743e+108
- 50 | 5.474092890215978e+81 | 2 | 4.1953167007143043e+104 | 1.0 | -8.54754834614123e+214
- 100 |1.6940933148244257e+113 | 4 |2.7943629163097755e+112 | 10.0 |1.0269811510907708e+307
- 200 | 4.8134180108812044e+138 | 8 | 5.5632919507235984e+101 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |4.162054515785872e+207 | 1 |-1.0107209325887732e+220 | 0.1 |-1.551240971677313e+213
- 50 |-2.440739320815385e+212 | 2 |-4.3275515220302434e+212 | 1.0 | nan
- 100 |1.0214416791741383e+214 | 4 |1.1218162332069701e+209 | 10.0 |nan
- 200 | 2.8478759007582135e+218 | 8 | 1.0217709028623184e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

```
10 | 281053.6892717875 | 1 | 5.645626436971277e+111 | 0.1 | 5.918078726822386e+112
```

- 50 |-4.4842570911100263e+73 | 2 |5.320968802608037e+108 | 1.0 | 4.789168087923847e+205
- 100 | 9.845635966644243e+104 | 4 | 2.931309934417528e+110 | 10.0 | nan
- 200 | 6.777737240847135e+139 | 8 | 7.006271666891828e+100 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 |-6.550946717218225e+210 | 1 |6.42093691031691e+217 | 0.1 |-2.0928712242286923e+214
- 50 |-1.0127742946069809e+211 | 2 | 2.54630935660651e+213 | 1.0 | nan
- 100 | 1.4886830392030376e+212 | 4 | -3.524732988256185e+209 | 10.0 | nan
- 200 | 3.269008876202718e+218 | 8 | 3.416337185103225e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |-1.7411448468616157e+26 | 1 |7.788495751752272e+110 | 0.1 |1.3477699699231438e+118
- 50 |-6.602253990349314e+74 | 2 |-1.536240861339966e+108 | 1.0 | 2.332964714724819e+202
- 100 |-1.0359795721416109e+111 | 4 |1.0374121538805898e+104 | 10.0 | nan
- 200 |1.464593455754941e+138 | 8 |1.1150805981974087e+104 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |1.022360393823991e+209 | 1 |9.78054272589155e+216 | 0.1 |-2.764253585313786e+214
- 50 | 2.063383113331989e+212 | 2 | 7.468935963226194e+214 | 1.0 | nan
- 100 | 3.5350446318700576e+214 | 4 | 5.033577207129591e+210 | 10.0 | nan
- 200 |-1.7165487601080114e+218 | 8 | 2.0070746927034743e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |4.2232543210113676e+21 | 1 |1.315384268233333e+108 | 0.1 |6.544747501168845e+110

```
50 |2.6580852886768416e+79 | 2 |-4.674470909301346e+110 | 1.0 |-2.693747753752943e+201

100 |-3.1838828096894275e+109 | 4 |-6.873449921082053e+104 | 10.0 |9.285412314020703e+306

200 |1.32032147034131e+139 | 8 |9.844447608996356e+101 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1.35836562407335e+210 | 1 |1.1177644950917274e+219 | 0.1 |-8.436808598920422e+213

50 |1.5945489511751028e+213 | 2 |4.365942154149638e+214 | 1.0 | nan

100 |-1.1184438914754177e+216 | 4 |3.558188179927858e+211 | 10.0 | nan

200 |-3.8687146062733124e+218 | 8 |8.92796504347209e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |6.004562332051188e+19 | 1 |1.5492059244547805e+117 | 0.1 |1.806185734240266e+109

50 |-1.0661866672818016e+82 | 2 |1.696698562084778e+108 | 1.0 |1.1410016201781382e+214

100 |5.005379384186941e+110 | 4 |2.284474418146504e+104 | 10.0 |5.946013130444508e+300

200 |9.480757368791391e+137 | 8 |-2.426680625277647e+104 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-6.330147690445354e+207 | 1 |6.460173730482653e+216 | 0.1 |6.565702858109736e+212

50 |1.1959313927514087e+210 | 2 |-2.6805803206344567e+214 | 1.0 | nan

100 |-9.877670791508315e+213 | 4 |6.233657905821862e+209 | 10.0 | nan

200 |1.8390672640608714e+219 | 8 |8.407436719003657e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 4.463864438462133e+17 | 1 | -2.2994293350976792e+115 | 0.1 | 2.0602014693139175e+110

50 | 2.4518736071830122e+73 | 2 | 3.611264330407994e+104 | 1.0 | -7.183071168454619e+207

```
100 |5.1043433579896994e+109 | 4 |4.846879378229176e+109 | 10.0 |nan
200 |3.4774105543266276e+139 | 8 |5.7709329019467184e+103 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2.184400423183505e+210 | 1 |-1.400069004604957e+217 | 0.1 |2.2731287880053356e+212

50 |2.978914066261042e+211 | 2 |1.279711897554009e+213 | 1.0 |nan

100 |2.8838329380073256e+213 | 4 |5.690180558628837e+210 | 10.0 |nan

200 |9.987767146048197e+216 | 8 |1.3741338388989592e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 5.416661291547309e+28 | 1 | -4.4562476857954064e+108 | 0.1 | -1.3841717747749747e+108

50 | 3.0397970749549805e+72 | 2 | 1.1147903772147834e+112 | 1.0 | -9.426090419059176e+207

100 | 2.7178090530671017e+104 | 4 | -2.5521788178587846e+102 | 10.0 | nan

200 | 7.567472162832822e+135 | 8 | 2.24479689231959e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.7696698816820767e+210 | 1 |2.1409649595058696e+221 | 0.1 |1.6940814763926445e+214

50 |1.8449120432180036e+211 | 2 |7.8992811982243e+212 | 1.0 |nan

100 |-5.137600112268776e+214 | 4 |-2.7808718341841046e+210 | 10.0 |nan

200 |5.19271968526884e+219 | 8 |-1.6817045450857308e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.3081517575880001e+21 | 1 |1.275832215457325e+117 | 0.1 |4.486809063271805e+112

50 |6.904284166852322e+74 | 2 |3.9912626719178105e+107 | 1.0 |-1.4110303430508433e+208

100 |-8.495042357197093e+104 | 4 |6.748545228130605e+101 | 10.0 |3.621219300988426e+302

```
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |6.299122428670017e+210 | 1 |4.444501808544312e+218 | 0.1 |3.05906638616829e+213
50 |-8.40725265096572e+212 | 2 | 9.875077764774303e+213 | 1.0 | nan
100 |-1.960400108375862e+213 | 4 |-9.045174176831048e+210 | 10.0 | nan
200 | 2.787960328457965e+218 | 8 | -2.93964519595011e+207 | 100.0 | nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |5.971280466861903e+16 | 1 |-9.543520662744071e+114 | 0.1 |-1.1904511180946586e+112
50 |-9.065774877191779e+80 | 2 |4.3954484618606835e+108 | 1.0 |3.122511258791159e+208
100 | 2.6111564744706916e+110 | 4 | 3.7050434737996586e+105 | 10.0 | -inf
200 |8.419788350625676e+140 | 8 | 1.664052932136176e+107 | 100.0 | nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |6.5545010985415465e+209 | 1 |3.887616770139285e+219 | 0.1 |7.108531614400062e+212
50 | 3.84468874402702e+209 | 2 | 2.0601701668113042e+215 | 1.0 | nan
100 | 3.5125150936876847e+214 | 4 | 7.457275969545165e+210 | 10.0 | nan
200 |-1.444508139570283e+218 | 8 | 1.6144107817204119e+208 | 100.0 | nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 96080953602771.42 | 1 | -2.8856252522796293e+111 | 0.1 | 7.976899098554747e+105
50 | 2.901886840459323e+80 | 2 | -2.0954035273116273e+111 | 1.0 | 2.6022679607400807e+211
```

100 |-3.6422325320145064e+109 | 4 | 4.2034436203032323e+107 | 10.0 | nan

200 |-4.9125478066632345e+144 | 8 | 3.89851294694231e+103 | 100.0 | nan

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.1643058351439338e+208 | 1 | 3.27699898110098e+220 | 0.1 | 9.513158949294682e+213

50 | 7.822256053476066e+210 | 2 | -6.139011785140284e+213 | 1.0 | nan

100 | 7.356531409251062e+211 | 4 | -1.7311281442287552e+211 | 10.0 | nan

200 | 1.8655079973969728e+215 | 8 | 1.0196648554552669e+208 | 100.0 | nan
```

```
Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.0806436752361614 | 1 | -8.783773344799516e+122 | 0.1 | -4.727471646490108e+110

50 | 2.55455457682823e+66 | 2 | 1.9571558329299465e+109 | 1.0 | 1.019694057727286e+209

100 | 2.7954559472035576e+109 | 4 | 6.864728302997345e+111 | 10.0 | nan

200 | -1.3331856187153733e+138 | 8 | 1.7382459192618727e+101 | 100.0 | nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-5.952485158625767e+210 | 1 |3.0989980890835124e+216 | 0.1 |1.1396236682174333e+215

50 |6.551282890587061e+210 | 2 |4.9603728214339904e+213 | 1.0 |nan

100 |1.7812736837398793e+211 | 4 |5.437571887476225e+210 | 10.0 |nan

200 |1.742712999849798e+218 | 8 |-8.099783088221839e+208 | 100.0 |nan

```
Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.4581409727839834 | 1 | -9.870213524123831e+116 | 0.1 | 6.090673579694257e+103

50 | 3.5664453137457625e+82 | 2 | -3.8932616089332465e+110 | 1.0 | 8.41569374725559e+212

100 | 4.0412462465080466e+101 | 4 | -6.130105602839589e+111 | 10.0 | nan

200 | -3.0486514375963774e+139 | 8 | -6.91580643173801e+101 | 100.0 | nan
```

```
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |1.5033872084565555e+207 | 1 |8.25132061536061e+219 | 0.1 |1.0086416038793612e+214
50 |1.1835781469004135e+213 | 2 |-1.0829870080328593e+215 | 1.0 | nan
100 | 2.4825890211018316e+213 | 4 | -1.1504021284198792e+211 | 10.0 | nan
200 |-6.850262523910636e+217 | 8 |-1.255738453676547e+207 | 100.0 |nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |1.0459879347748593e+22 | 1 |-1.5548132173685076e+114 | 0.1 |9.411760834298559e+111
50 |-1.1667229186183717e+75 | 2 | 5.8626950103773e+104 | 1.0 | | 3.227889899749799e+210
100 |-4.2675632120937486e+111 | 4 |6.505450535225832e+103 | 10.0 |nan
200 |1.715028982321362e+141 | 8 |1.8900052182594408e+106 | 100.0 |nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |1.0302270320230998e+208 | 1 |-1.6648972911765418e+218 | 0.1 |1.3022526295677732e+215
50 | 6.908723272189485e+212 | 2 | 1.869094607488309e+213 | 1.0 | nan
100 | 6.488620472178913e+215 | 4 | 4.218356271187507e+208 | 10.0 | nan
200 |1.8236235160360646e+218 | 8 |4.9096400734993924e+207 | 100.0 |nan
Table: Training accuracies with different hyper-parameters
```

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 0.8259596472464922 | 1 | 4.5534017994871324e+113 | 0.1 | 1.3983922416533835e+109

50 | -8.713205564404602e+79 | 2 | 6.185154945556519e+112 | 1.0 | -1.0480319111748471e+212

100 | -1.2317504409596497e+114 | 4 | 5.717568339582999e+106 | 10.0 | nan

200 | 1.9453838789681044e+140 | 8 | -1.4211414275318612e+109 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |3.0131470611271984e+210 | 1 |2.069218695638281e+216 | 0.1 |-4.0455971660564436e+213
50 | 2.3351190451570568e+212 | 2 | 1.9148447677438194e+215 | 1.0 | | nan
100 | 7.781092152893194e+215 | 4 | 1.779746920696795e+210 | 10.0 | nan
200 |-7.256395786793258e+216 | 8 | 3.0330009375994767e+207 | 100.0 | nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |1.214714684759575e+16 | 1 |-5.8879080865327996e+109 | 0.1 |1.1237494793981428e+113
50 | 9.516434292321881e+75 | 2 | 2.0619736235817875e+107 | 1.0 | 2.1050079409442934e+212
100 |3.2558651269199755e+111 | 4 |6.088694433609547e+107 | 10.0 |nan
200 |-2.3238514268134593e+134 | 8 |-4.995020601090372e+102 | 100.0 | nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 1.0358586633536702e+209 | 1 | 1.4167257896385341e+217 | 0.1 | -1.0011127949007629e+215
50 |-9.513553600448536e+211 | 2 | 1.9155759774702817e+214 | 1.0 | nan
100 | 5.559195479774964e+212 | 4 | 2.4907181092959023e+209 | 10.0 | nan
200 | 4.250045475640002e+218 | 8 | 2.9997499179664157e+207 | 100.0 | nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 0.5298605665065259 | 1 | 3.8867896088192975e+106 | 0.1 | -1.3648512417160558e+108
50 |-4.480361267793741e+82 | 2 | 1.8913344803195262e+110 | 1.0 | 2.5206626072607245e+204
100 |1.943403859583451e+109 | 4 |1.9966069607499632e+101 | 10.0 |-inf
200 |9.812805474188259e+130 | 8 |5.197402083305349e+101 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

```
10 |2.100028656327172e+210 | 1 |1.4534942347165304e+219 | 0.1 |1.6027074417925677e+214
```

- 50 | 6.556374842958114e+211 | 2 | -2.311957127250301e+213 | 1.0 | nan
- 100 |-5.55502602983419e+214 | 4 |-9.858502031273959e+209 | 10.0 | nan
- 200 |1.4128438571884584e+217 | 8 |-2.9005651626283476e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 6.662633180153943 | 1 | 1.5643986099997502e+111 | 0.1 | 6.457176337833762e+113
- 50 | 3.7966841985424504e+87 | 2 | 3.1053309474634935e+117 | 1.0 | 2.9913855649715425e+210
- 100 | 2.6003066205814703e+114 | 4 | -1.6626171325241104e+102 | 10.0 | nan
- 200 | 9.41027285331256e+136 | 8 | 4.070427230184081e+101 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 7.259757060088334e+210 | 1 | 1.4802657539753507e+218 | 0.1 | 3.308143747502485e+213
- 50 |1.0147457753309175e+211 | 2 |2.0066948410929748e+216 | 1.0 | nan
- 100 | 6.523961095487844e+212 | 4 | 2.2957881249161795e+209 | 10.0 | nan
- 200 | 2.5123868638113626e+219 | 8 | 3.0478910452528077e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 14777339353034.037 | 1 | 7.984475886084914e+118 | 0.1 | -1.8338244511068686e+111
- 50 |-1.661088823243705e+82 | 2 |5.945680638679516e+108 | 1.0 |1.0989444483257659e+212
- 100 | 2.0921796112122514e+109 | 4 | 1.79510381198169e+110 | 10.0 | 2.761577293065664e+304
- 200 |-9.014625911131131e+143 | 8 |-6.08676889924308e+103 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2.7940645649589543e+210 | 1 |-5.763730418765131e+218 | 0.1 |8.400751404760248e+212

```
50 | 2.92053683157505e+210 | 2 | -5.046987558929888e+214 | 1.0 | nan

100 | 2.460141049044527e+211 | 4 | -7.867348303133868e+209 | 10.0 | nan

200 | -1.829395452311602e+218 | 8 | -3.230658074339598e+207 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 4.956376263776349e+18 | 1 | 1.3856175511780997e+118 | 0.1 | 1.7666137086109734e+114
- 50 | 8.604947546469333e+81 | 2 | 8.341936260544356e+114 | 1.0 | 8.556716997032355e+200
- 100 | 3.234801967759543e+109 | 4 | -1.3485171869742768e+112 | 10.0 | -inf
- 200 |2.0939370194680003e+137 | 8 |1.4336318594252256e+109 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |8.925692878064917e+208 | 1 |-1.5512516441360568e+219 | 0.1 |3.686705957043992e+212
- 50 |1.2768500492375363e+211 | 2 |1.893513664323486e+213 | 1.0 |nan
- 100 |-2.304426762908139e+216 | 4 | 7.378270356673428e+208 | 10.0 | nan
- 200 |8.167298458565111e+215 | 8 |-3.227834958101882e+206 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |5.650858542839681e+23 | 1 |3.762205995187919e+120 | 0.1 |1.1971213446620274e+111
- 50 |-2.1562800183344038e+80 | 2 |-7.929072180030249e+110 | 1.0 |-4.906439171809778e+211
- 100 |1.5265774901467426e+109 | 4 |1.2676938606075887e+103 | 10.0 | nan
- 200 |-5.296383296434461e+139 | 8 | 1.4908210646109467e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

- 10 | 7.60272182295116e+210 | 1 | 1.9810494353465441e+217 | 0.1 | 4.8056895195447226e+212
- 50 |-1.3822118698567983e+213 | 2 |2.0199626222091002e+214 | 1.0 | nan

```
100 |6.499077882141983e+213 | 4 |-1.5342239845161313e+209 | 10.0 |nan
200 |9.465902912931629e+216 | 8 |1.2631969162804098e+209 | 100.0 |nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 94540455138.14452 | 1 | 3.990809601983324e+110 | 0.1 | 2.3626418233662927e+111

50 | 2.385658605593896e+64 | 2 | 5.3669843316774415e+107 | 1.0 | -1.0569009165393628e+213

100 | 9.289198296131137e+112 | 4 | 5.5231773750855316e+107 | 10.0 | 5.155779208331805e+305

200 | -1.6985438906292428e+142 | 8 | -2.287072734314766e+102 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | |3.013310526161607e+210 | 1 |2.1882116046069156e+218 | 0.1 | |1.402639473306714e+214

50 | |-1.9753735983216157e+210 | 2 |5.933572358107158e+213 | 1.0 | |nan

100 | |5.886974536849354e+213 | 4 |2.9580302718667746e+209 | 10.0 | |nan

200 | |3.2108748485629163e+217 | 8 | |-6.64911769775409e+206 | 100.0 | |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1.1379491888280188e+25 | 1 |2.9575248074270634e+111 | 0.1 |-1.263520342437962e+103

50 |-1.5360689910627052e+85 | 2 |6.969904243676614e+107 | 1.0 |1.411142907358768e+212

100 |6.164272278343707e+99 | 4 |2.202784322765544e+106 | 10.0 |-inf

200 |9.083093618328774e+144 | 8 |1.4337113698867502e+101 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.5520125366455845e+207 | 1 | 2.7879749322479744e+218 | 0.1 | -5.67096791370079e+216

50 | 6.1462383132689275e+211 | 2 | -1.3341993839247395e+215 | 1.0 | nan

100 | 9.536395437322947e+212 | 4 | 3.015841742507014e+208 | 10.0 | nan

```
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |2.245003165499533e+25 | 1 |1.85495101352403e+116 | 0.1 |2.6054799809805314e+111
50 |9.727060304473276e+83 | 2 |1.43965562806216e+109 | 1.0 |6.265920217966832e+221
100 | 3.5945815875546006e+107 | 4 | 6.422081316727344e+106 | 10.0 | 2.5882677228478615e+307
200 | 2.7773689153180224e+140 | 8 | 2.1677771452637387e+101 | 100.0 | nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |-5.6422820555021865e+212 | 1 |2.994491022849056e+219 | 0.1 |-5.36717763856509e+214
50 |-9.329977478923965e+212 | 2 | 6.20461510583578e+213 | 1.0 | nan
100 |-7.330506309272866e+214 | 4 | 6.866338962836471e+210 | 10.0 | nan
200 |-3.6593460360178753e+217 | 8 |4.283197043464501e+207 | 100.0 |nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |0.12636518665254334 | 1 |8.852747961560105e+114 | 0.1 |4.221943366066231e+112
50 | 6.229184251057646e+79 | 2 | 7.541935258546174e+111 | 1.0 | 6.567363458679411e+207
100 |-1.258426504235913e+111 | 4 | 1.849979864933637e+103 | 10.0 | nan
200 |4.562412524471502e+141 | 8 |2.8228765775660424e+102 | 100.0 |nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |1.1655427228237805e+211 | 1 |2.8272527684251735e+220 | 0.1 |2.5202120484726854e+215
50 | 3.017745944090743e+211 | 2 | -3.2538531239803553e+212 | 1.0 | | nan
100 |1.0841518502644878e+215 | 4 |1.4027753180293044e+209 | 10.0 |nan
```

200 |8.24086862876778e+217 | 8 |2.879479332593709e+207 | 100.0 |nan

```
Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 6.559892665127857e+16 | 1 | -9.178663352516927e+123 | 0.1 | 9.705325848109949e+113

50 | 9.55090976858361e+77 | 2 | 4.83027109463331e+106 | 1.0 | 1.6986425968003927e+208

100 | 7.88948883450899e+115 | 4 | 6.475851306669798e+108 | 10.0 | nan

200 | 1.227992103998095e+139 | 8 | 1.8927202861086152e+107 | 100.0 | nan
```

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-3.5762966436168394e+209 | 1 |2.0216002721131936e+217 | 0.1 |5.329515757552972e+216

50 |4.194302535606083e+212 | 2 |1.0204329044534335e+215 | 1.0 |nan

100 |5.640798122739543e+214 | 4 |7.721657177208923e+209 | 10.0 |nan

200 |-6.375662538109223e+218 | 8 |2.4185981334012324e+208 | 100.0 |nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |949089807705.9165 | 1 |4.4717493414878845e+110 | 0.1 |5.682724967297716e+111

50 |-5.1546513355397026e+85 | 2 |1.2447883037936401e+104 | 1.0 |-1.0915855715788622e+208

100 |6.285172872652486e+112 | 4 |4.280948765013741e+106 | 10.0 |-inf

200 |-1.512136401049104e+143 | 8 |1.6302396712210776e+104 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-6.702967975526717e+207 | 1 |1.2162328586057143e+219 | 0.1 |1.6753738530557166e+213

50 |4.985041132020246e+212 | 2 |-6.746568243276345e+213 | 1.0 | nan

100 |-1.139763919652464e+214 | 4 |-1.19003640625925e+211 | 10.0 | nan

200 |2.616481073811317e+216 | 8 |-8.622683030967093e+206 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-3.252162904997476e+20 | 1 |5.244879057491058e+108 | 0.1 |1.289726121068709e+106

50 |6.973548007551732e+83 | 2 |-2.132092806304701e+109 | 1.0 |-4.7744922010413295e+203

100 |-1.5358338528299207e+105 | 4 |-8.267831187310923e+103 | 10.0 | nan

200 |3.1450811264117505e+141 | 8 |6.825512567546038e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2.851370024130372e+210 | 1 |1.559504503480341e+217 | 0.1 |1.365005035255471e+215

50 | 8.41196531727669e+213 | 2 | 7.246092183672974e+213 | 1.0 | nan

100 | 9.520454129532132e+211 | 4 | 5.29028274693494e+210 | 10.0 | nan

200 |-6.447420984141193e+216 | 8 |-3.1847257048697655e+206 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |3613798848523130.5 | 1 |-3.725306032334616e+113 | 0.1 |4.1893313079570827e+105
- 50 |2.0929902247522256e+78 | 2 |2.444741682563173e+108 | 1.0 |1.8206546937585136e+211
- 100 |-6.658568730867329e+108 | 4 |5.208833392264194e+105 | 10.0 |6.066168313889218e+303
- 200 |-5.909759797908521e+142 | 8 | 1.2747639867066503e+103 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |3.764233623645812e+210 | 1 |1.0957276999432635e+218 | 0.1 |1.10903443879857e+216
- 50 | 7.875529202272559e+210 | 2 | -2.4089116664488088e+216 | 1.0 | | nan
- 100 |1.6254633581988735e+214 | 4 | 7.856039456633101e+210 | 10.0 | nan
- 200 |2.585257245483959e+217 | 8 |-2.2371312875637034e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |9878248881349338.0 | 1 |1.5945506581029987e+113 | 0.1 |3.0033347938243606e+108
50 | 1.27264411488576e+93 | 2 | -1.8250431244395668e+111 | 1.0 | -1.7011451404390948e+210
100 |-1.3311649228189559e+107 | 4 |2.211987942958182e+106 | 10.0 | nan
200 |4.672456337200252e+144 | 8 |2.455953773118838e+104 | 100.0 |nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |1.5471009492432492e+211 | 1 |1.1500426816909039e+219 | 0.1 |3.2405979036598316e+211
50 |1.381175582022442e+213 | 2 |1.2841487579820567e+215 | 1.0 | |nan
100 |-8.578692995582524e+215 | 4 |-3.871060255574359e+211 | 10.0 | nan
200 |-9.797986266970411e+216 | 8 |-3.9959663118425665e+204 | 100.0 | nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |2.19343022641847e+19 | 1 |1.091353133656954e+126 | 0.1 |1.4759699245250634e+110
50 |-6.314729024204743e+72 | 2 |8.328421037493386e+110 | 1.0 |1.0384640247175158e+208
100 |-6.465453790994439e+105 | 4 |4.415983767175015e+102 | 10.0 |nan
200 |5.801370721063024e+136 | 8 |1.650992666325736e+100 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.75065967994115e+209 | 1 | 1.4143726097636114e+217 | 0.1 | -6.031434826018988e+214

50 | 7.076956321386588e+208 | 2 | 2.5672402671583986e+214 | 1.0 | nan

100 | 4.7388674479681797e+213 | 4 | 1.3236777701111363e+210 | 10.0 | nan

200 | 8.498595049160442e+219 | 8 | -6.809253824793349e+205 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

```
10 | 1.2740879972881434e+16 | 1 | 3.79498699004196e+113 | 0.1 | -8.363454364710364e+109
```

- 50 | 2.0204048048518844e+87 | 2 | 4.679368435767431e+110 | 1.0 | 1.2901204343688433e+213
- 100 | 4.540046535927828e+106 | 4 | 1.4165284250197474e+104 | 10.0 | nan
- 200 | 4.0701888641683445e+142 | 8 | 1.490101497254434e+106 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 |-2.025450907024407e+209 | 1 |3.3492126034648985e+217 | 0.1 |-4.264668947550336e+214
- 50 |-1.3890290939622216e+212 | 2 | 3.002087973296729e+214 | 1.0 | nan
- 100 | 1.0476462503617112e+213 | 4 | -7.969868502136216e+208 | 10.0 | nan
- 200 | 6.531416335514712e+216 | 8 | 7.800924867523963e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 15681282330.15809 | 1 | 1.7624855740669847e+118 | 0.1 | 3.7486953119202526e+108
- 50 | 1.6622772591310773e+76 | 2 | -3.66536188480009e+109 | 1.0 | -1.1921501176492642e+212
- 100 | 6.93881367307489e+108 | 4 | -2.072941277805008e+112 | 10.0 | nan
- 200 |6.948003835243768e+140 | 8 |-1.2732017321351674e+110 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |-3.4823656321710892e+208 | 1 |3.7398315007248076e+217 | 0.1 |-3.2694984491828736e+212
- 50 | 9.027728422449662e+211 | 2 | 5.394399844292877e+216 | 1.0 | nan
- 100 |-1.8150250716004065e+214 | 4 |1.1171227826967069e+209 | 10.0 | nan
- 200 | 7.767053740129707e+217 | 8 | -2.401094340585271e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

```
10 |1.490624455186795 | 1 |4.987040572550879e+115 | 0.1 |5.395955869269326e+106
```

- 50 |-6.467084922687309e+81 | 2 |6.2132524499291654e+106 | 1.0 |3.176969747860321e+210
- 100 |1.530526255298016e+105 | 4 |4.56735874164266e+103 | 10.0 | nan
- 200 | 2.5026746812793062e+141 | 8 | 8.084409151468766e+101 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 | 1.9808968934252653e+210 | 1 | 1.0995403305563135e+217 | 0.1 | 3.389809543073405e+214
- 50 |5.702231083091101e+212 | 2 |3.665626474745028e+212 | 1.0 |nan
- 100 | 1.4711411332143684e+214 | 4 | 4.357697946564616e+211 | 10.0 | nan
- 200 | 6.632791949511248e+217 | 8 | -1.5724581375722287e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 9759023364.763916 | 1 | 2.317504152689068e+112 | 0.1 | -1.769132828706467e+108
- 50 | 9.787168878354811e+84 | 2 | 1.0221556562911468e+110 | 1.0 | -9.320645032306726e+211
- 100 |3.7486979117735694e+110 | 4 |-4.8695235339132525e+107 | 10.0 |4.0957246280640686e+304
- 200 |-1.3225640443793607e+138 | 8 |-7.44068664757278e+103 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |1.3231535307987037e+209 | 1 |-5.416330606825574e+219 | 0.1 |1.9411684051300887e+213
- 50 |-6.404257423044086e+211 | 2 | 1.9816779197433267e+214 | 1.0 | | nan
- 100 | 7.347840923732669e+212 | 4 | -2.0588844264000111e+211 | 10.0 | nan
- 200 |1.2104880855907883e+217 | 8 |-1.4442556152528681e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

```
10 |1.6817674285383334e+17 | 1 |1.0748778822433184e+114 | 0.1 |1.8835364936264577e+105
50 |6.233477703416443e+80 | 2 |1.0961348584752557e+112 | 1.0 |2.3659638319645814e+212
```

100 |4.290526225116407e+111 | 4 |-1.1255277271465175e+104 | 10.0 |-1.7087331319389085e+307

200 | 4.708990515103246e+141 | 8 | -1.2641426735079495e+105 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 6.5002900875246825e+209 | 1 | 1.7033769988659139e+214 | 0.1 | -1.9857178906039834e+214
- 50 | 3.0604808293397125e+209 | 2 | 2.2252000003341774e+215 | 1.0 | nan
- 100 |-2.825265932187031e+213 | 4 |-4.4996131703389285e+211 | 10.0 | nan
- 200 | 3.3584017863761893e+217 | 8 | 1.1982952107670198e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |2.504752613792009e+22 | 1 |3.189173166179953e+111 | 0.1 |5.8543222388129914e+107
- 50 |4.1187350553884775e+79 | 2 |7.162860857142426e+112 | 1.0 |3.2361544304628853e+201
- 100 | 7.953089174394209e+107 | 4 | -6.0406361433933225e+106 | 10.0 | nan
- 200 |-1.83559299046973e+137 | 8 |6.823364020722354e+106 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |4.550547501843048e+209 | 1 |2.0594190131037292e+219 | 0.1 |-1.3065267312809363e+214
- 50 | 6.411605588424347e+214 | 2 | 3.461108526964528e+215 | 1.0 | nan
- 100 | 9.335654277124306e+212 | 4 | 2.0955556475721482e+211 | 10.0 | nan
- 200 |1.118193030873965e+218 | 8 |-1.4079218185275713e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

```
10 | 9396396694023.254 | 1 | 1.0410319197809215e+110 | 0.1 | 1.2799658034559096e+106
```

- 50 | 2.8757545887374716e+75 | 2 | 1.990203490983569e+109 | 1.0 | -1.5422401501428837e+207
- 100 | 9.259556232609803e+112 | 4 | 7.633917273526524e+106 | 10.0 | nan
- 200 | 3.963566917559621e+137 | 8 | -8.17945497588391e+107 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 |2.5318217264049585e+209 | 1 |-1.1821137418369019e+219 | 0.1 |5.433021503308024e+213
- 50 |1.8705787406100959e+211 | 2 |9.140728811870805e+213 | 1.0 |nan
- 100 |-3.151708555559506e+213 | 4 | 5.443331440432598e+209 | 10.0 | nan
- 200 |2.2880255505959934e+216 | 8 |-3.978040889168139e+208 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 2.7204123959395037e+19 | 1 | 2.9518681384661614e+112 | 0.1 | 2.5032682435026836e+106
- 50 | 5.3551149102712404e+79 | 2 | -6.813436314625104e+112 | 1.0 | 4.994861919470534e+205
- 100 |3.8220299628129665e+111 | 4 |8.243861542169223e+107 | 10.0 |nan
- 200 |-8.982810512783562e+140 | 8 | 3.6752342197211925e+105 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 4.4528520408058605e+209 | 1 | -5.499956456690793e+218 | 0.1 | -1.4480618116029009e+214
- 50 | 2.881631545527945e+211 | 2 | 3.257716174599243e+212 | 1.0 | nan
- 100 | 2.7216792269310283e+213 | 4 | 1.6555223925521058e+209 | 10.0 | nan
- 200 | 2.0949287254626503e+218 | 8 | -4.975906647237704e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1065095581593.3256 | 1 | 1.0942117007165013e+106 | 0.1 | -1.343414748727026e+112

```
50 |6.621698678030423e+71 | 2 |4.848872911006043e+108 | 1.0 |2.265086756536901e+204
100 |-5.834912024598974e+108 | 4 |3.785742276911938e+103 | 10.0 |nan
200 |6.301626470816987e+137 | 8 |-7.739752779723256e+103 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 | 1.0950409844151055e+212 | 1 | 6.057832438012426e+217 | 0.1 | 3.558891321926778e+213
- 50 |2.1685656869585886e+212 | 2 |8.199312140650124e+214 | 1.0 |nan
- 100 |-2.8178383614335007e+215 | 4 |1.9997824644210318e+209 | 10.0 |nan
- 200 |1.1790086439349593e+218 | 8 |2.33792350095656e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 | 7827889050.09373 | 1 | 6.9259965067089045e+109 | 0.1 | 9.718787966869479e+108
- 50 |-2.2754569734514574e+86 | 2 |-2.4682897026989876e+112 | 1.0 | 2.2408230963225785e+214
- 100 |-1.1040860463218733e+111 | 4 |-1.11702091612878e+111 | 10.0 | nan
- 200 |-3.5145879243129904e+144 | 8 |-1.5889385025420004e+102 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 |-5.207457907311324e+210 | 1 |6.899996611041438e+216 | 0.1 |-4.733627007544547e+213
- 50 |-1.746623827649505e+212 | 2 |-8.610139016634478e+213 | 1.0 | nan
- 100 | 6.311271976500989e+212 | 4 | -1.0914268618448818e+211 | 10.0 | nan
- 200 |-5.3818048831166985e+218 | 8 | 2.207237222868191e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

- 10 |4.256810920242916e+19 | 1 |-6.121234066330069e+112 | 0.1 |-6.563201853837586e+120
- 50 | 2.573338571740396e+85 | 2 | -1.1453241054597907e+104 | 1.0 | 8.18539078831745e+201

```
100 |6.4980326138534e+106 | 4 |8.631348826986876e+106 | 10.0 |nan
200 |5.654640788453179e+139 | 8 |1.192336726198981e+102 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.882391509483832e+210 | 1 | 1.8177382556347655e+218 | 0.1 | 4.430451665644911e+213

50 | 2.5071414295037645e+212 | 2 | 4.7165306436001734e+213 | 1.0 | nan

100 | 4.0342960465651544e+212 | 4 | -2.0289613099797282e+210 | 10.0 | nan

200 | 1.0620108376846074e+217 | 8 | 6.754973996882745e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2121581650.2714329 | 1 |-1.1541864054863006e+116 | 0.1 |1.2724184249531955e+112

50 |1.0085787509909746e+82 | 2 |2.2370164089652033e+106 | 1.0 |-2.785820373709816e+216

100 |-5.042811125067139e+111 | 4 |-2.654893909384744e+103 | 10.0 | nan

200 |7.081455747300285e+137 | 8 |-5.423912874285194e+101 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.587907020090219e+210 | 1 |-8.704909167498747e+217 | 0.1 |-3.195197237669536e+213

50 |2.5159908555719062e+212 | 2 |4.242978541448562e+213 | 1.0 |nan

100 |2.0004330339812048e+213 | 4 |1.0664432174120649e+209 | 10.0 |nan

200 |-6.237278198840779e+215 | 8 |2.3421290772832503e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |10.028277503777344 | 1 |3.140572485535413e+110 | 0.1 |1.4257138499383032e+114

50 |7.334945734070441e+85 | 2 |5.396621779645526e+107 | 1.0 |2.65685119349575e+210

100 |1.7678612809638606e+106 | 4 |3.70611624262352e+104 | 10.0 | nan

```
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |7.095993965187165e+207 | 1 |-8.50826964496959e+218 | 0.1 |5.168366521278811e+211
50 | 2.3346730964699206e+210 | 2 | -3.0621820636539497e+211 | 1.0 | nan
100 |-3.203663807036103e+214 | 4 | 1.9104795819438442e+209 | 10.0 | nan
200 | 2.8682084243611317e+218 | 8 | 3.2504951719469544e+207 | 100.0 | nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |2.1926902637387076e+16 | 1 |-3.086493901366968e+120 | 0.1 |-1.6050287498576632e+112
50 |-6.944840574159301e+89 | 2 |2.4493234835768317e+112 | 1.0 |7.484037371634772e+211
100 |3.3383778522421765e+106 | 4 |-7.649538526394943e+107 | 10.0 |nan
200 | 4.6308991290088555e+141 | 8 | 1.2664413216716686e+103 | 100.0 | nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |-8.82552896970993e+211 | 1 |7.628838514230881e+217 | 0.1 |-4.488896150938129e+214
50 |-4.318518870643816e+210 | 2 | 3.3963829122562495e+212 | 1.0 | nan
100 | 4.534857332655187e+213 | 4 | 1.551913202889483e+211 | 10.0 | nan
200 | 4.1823764795461295e+217 | 8 | -1.1887203391597866e+207 | 100.0 | nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 7.07152138444167e+26 | 1 | 3.007596190848825e+104 | 0.1 | -8.554808500637436e+108
50 | 7.905556673520751e+84 | 2 | 4.241562731870862e+112 | 1.0 | 1.0226449267477716e+210
100 |1.3175544418910511e+104 | 4 |3.718507125256038e+100 | 10.0 | nan
```

200 | 7.613743281393662e+142 | 8 | 6.787253242185234e+103 | 100.0 | nan

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1.1821035512273377e+209 | 1 |-4.164551820523059e+221 | 0.1 |5.350302877645293e+212

50 |-6.298701733785658e+210 | 2 |2.841233729544876e+214 | 1.0 | nan

100 |5.815249507000918e+214 | 4 |2.09412143813611e+210 | 10.0 | nan

200 |5.3428865979215474e+219 | 8 |-1.7681568648013733e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-10056682924891.986 | 1 |1.0128619105314044e+107 | 0.1 |-1.369868885772458e+108

50 |1.4793536020191758e+81 | 2 |3.936168634279598e+106 | 1.0 |-1.5052431038445123e+214

100 |-1.0177662126453206e+117 | 4 |3.244590363362442e+107 | 10.0 |nan

200 |-2.1589636791315838e+139 | 8 |2.1013007505753288e+104 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2.466736139724313e+211 | 1 |-1.3759854912815847e+220 | 0.1 |1.9716066235850896e+215

50 |6.735181797322247e+211 | 2 |-1.2361764766267937e+215 | 1.0 | nan

100 |2.0019869890043705e+214 | 4 |-1.6687035506492015e+210 | 10.0 | nan

200 |-4.127713978649064e+217 | 8 |-1.1662426833059805e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.2093537446184723e+21 | 1 | -1.0982764122812758e+115 | 0.1 | 7.081953231807516e+108

50 | 1.9897915720227497e+81 | 2 | 9.9746121364285e+112 | 1.0 | 5.633664757465649e+210

100 | 9.022319707304648e+113 | 4 | 2.5168138816903214e+102 | 10.0 | -inf

200 | -1.7807313798898218e+142 | 8 | 6.121645744173871e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.2842563441814205e+209 | 1 |-1.9033368780737115e+217 | 0.1 |7.142146680799863e+214

50 |-6.889395263873023e+210 | 2 |-6.859930816088507e+212 | 1.0 | nan

100 |8.222816061840974e+211 | 4 |1.5225841383381095e+209 | 10.0 | nan

200 |2.6830356980026526e+217 | 8 |8.98792289761991e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |-4.277970431671806e+17 | 1 |-1.2649069818368726e+115 | 0.1 |1.7458208526195822e+105
- 50 | 3.824551997660066e+82 | 2 | -6.0936824678305055e+112 | 1.0 | -1.097437925337643e+211
- 100 | 1.6332362667454773e+112 | 4 | 5.206182624759085e+108 | 10.0 | 3.750333094399853e+300
- 200 |8.074337915559008e+139 | 8 |3.7786285502491755e+102 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |-2.559452158163762e+210 | 1 |1.2849886550985227e+216 | 0.1 |3.002908794245318e+213
- 50 | 7.266163002667783e+211 | 2 | 4.564727421775664e+214 | 1.0 | nan
- 100 |-5.235155854854218e+214 | 4 |-4.2157510367367314e+210 | 10.0 | nan
- 200 |2.4488378278844283e+215 | 8 |-1.5867537492015035e+206 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |219121051434258.34 | 1 |7.108447436855589e+115 | 0.1 |-1.6697496643079038e+113
- 50 |-3.5711381112550656e+85 | 2 |1.5961401261487713e+110 | 1.0 |5.049091324859215e+210
- 100 |2.1089025229947636e+103 | 4 |6.998098869468207e+112 | 10.0 |nan
- 200 |-2.099008091200316e+140 | 8 |-7.000032415671044e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.2322110648430344e+210 | 1 |7.054534702956105e+215 | 0.1 |-6.106780547554879e+215

50 |-2.1039871805960814e+212 | 2 |2.944624501041266e+214 | 1.0 | nan

100 |-8.89785965905056e+212 | 4 |3.6047130924025643e+210 | 10.0 | nan

200 |1.485079847523801e+218 | 8 |1.2817364525792155e+206 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |4.60512348172449e+20 | 1 |-9.349924227581036e+117 | 0.1 |4.846683782018512e+108

50 |1.081546965366502e+75 | 2 |2.3793308566038944e+106 | 1.0 |1.7977542009521972e+202
```

100 |-4.630374314002817e+109 | 4 |-5.471578833142131e+108 | 10.0 |5.834487948375929e+306

200 |5.2072222646659926e+141 | 8 |-2.371232929766845e+100 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 6.336851397168994e+210 | 1 | 5.718102940516254e+217 | 0.1 | 3.671594683926799e+211

50 | 1.3767394037380424e+211 | 2 | -4.374097402113475e+214 | 1.0 | nan

100 | -3.179965476547389e+216 | 4 | -3.107205674874421e+210 | 10.0 | nan

200 | -3.2185254181566307e+218 | 8 | -2.76234662265948e+209 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.428053965417113e+25 | 1 | -1.209890400683223e+111 | 0.1 | 8.32174825330209e+115

50 | 1.0509999476197717e+82 | 2 | -3.123253311776324e+107 | 1.0 | -8.188346727796368e+215

100 | -6.812109492019455e+113 | 4 | 7.139497483043145e+103 | 10.0 | 2.7418992454343806e+302

200 | 4.5336209204848474e+141 | 8 | -2.1492558358941062e+103 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

```
10 |-1.3175456043308853e+213 | 1 |-2.6065719195154722e+219 | 0.1 |-
1.728264645891017e+211

50 |2.0107279432807041e+211 | 2 |2.2272290566377113e+212 | 1.0 | nan

100 |2.0773419163086564e+213 | 4 |-1.753027603508954e+209 | 10.0 | nan

200 |1.2119832466220943e+218 | 8 |-1.7008051539778589e+208 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 12389649617.83265 | 1 | 1.4025227695380196e+113 | 0.1 | 1.7696123196754414e+115
- 50 | 4.1498573993593456e+86 | 2 | 7.475281944920952e+108 | 1.0 | -8.573231619471374e+215
- 100 |-1.7554803185443624e+108 | 4 | 8.350532718354252e+100 | 10.0 | nan
- 200 | 6.293886936212287e+138 | 8 | 4.0087627114597867e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 6.231248548456369e+210 | 1 | -2.632127792514549e+218 | 0.1 | 9.99909701338298e+215
- 50 |1.7619171066965422e+212 | 2 |7.847051077806931e+213 | 1.0 | |nan
- 100 | 1.487777160112981e+214 | 4 | -8.072247933807115e+209 | 10.0 | nan
- 200 |-1.4672369592599676e+219 | 8 |2.4547313985152095e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |1.05947172376922e+19 | 1 |1.032885857729942e+115 | 0.1 |-4.1986119883369146e+102
- 50 |-1.5966385271887558e+82 | 2 |1.7643048733448788e+112 | 1.0 | 2.4185988827858228e+213
- 100 |-3.750498422625589e+111 | 4 | 2.3457395126918134e+104 | 10.0 | nan
- 200 | 9.904406196102862e+138 | 8 | -4.71929971979729e+105 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

```
10 |1.9242712169667037e+210 | 1 |-4.2941664502506527e+220 | 0.1 |8.407362127311171e+212
50 |-5.957401041240883e+210 | 2 |-3.725778597468803e+216 | 1.0 |nan
100 |1.952421514549935e+214 | 4 |-3.329494463683729e+209 | 10.0 |nan
200 |9.490714159478682e+217 | 8 |-1.8380389885595267e+205 | 100.0 |nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.7728822330702636e+18 | 1 |9.715840551501112e+115 | 0.1 |1.5980415558279862e+115

50 |3.2123755810714718e+84 | 2 |-1.1153500597057759e+108 | 1.0 |8.327458651916776e+210

100 |3.9252622998387306e+110 | 4 |5.584276485739044e+102 | 10.0 |-inf

200 |-2.0616352008182664e+138 | 8 |-3.019197410169204e+102 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.6656464668521965e+211 | 1 | -8.968025775766336e+217 | 0.1 | -7.689938992029065e+213

50 | 8.548575290507933e+209 | 2 | 6.054744010102108e+211 | 1.0 | nan

100 | 4.9268666974333405e+212 | 4 | 3.948658293019738e+209 | 10.0 | nan

200 | 8.457675980098504e+215 | 8 | 4.370907910530119e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 124.6068749358352 | 1 | 2.1461557087641585e+118 | 0.1 | 8.26704254353695e+109

50 | 1.7486949682926112e+85 | 2 | -9.416347688213537e+109 | 1.0 | 1.0981414995558826e+204

100 | 4.2160465333667e+112 | 4 | 3.5169896692774426e+109 | 10.0 | nan

200 | -8.295654190294832e+139 | 8 | -2.0742095794521872e+99 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 3.8595947700922696e+209 | 1 | 4.0984677816874886e+221 | 0.1 | -9.774745532242525e+215

```
50 |-1.6589351313813022e+211 | 2 |-2.795532992727941e+213 | 1.0 | nan
100 |1.1130285232184933e+213 | 4 |-1.0873364061917808e+209 | 10.0 | nan
200 |-3.211977656807966e+217 | 8 |1.6785504705763092e+207 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 50 | 3.9963144567517174e+92 | 2 | -7.188124381747037e+111 | 1.0 | -7.522206857924125e+209
- 100 | 7.494042174905312e+108 | 4 | -3.863669682784224e+109 | 10.0 | nan
- 200 |1.4593235803886291e+138 | 8 |-4.0004429225096704e+102 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 2.9405540440733067e+207 | 1 | 1.2442571789988925e+218 | 0.1 | 2.4264310229684528e+213
- 50 | 1.1799248011847854e+212 | 2 | 3.28197048698552e+214 | 1.0 | nan
- 100 |-4.382004810266824e+214 | 4 | 5.679031096861521e+211 | 10.0 | nan
- 200 |8.025685810831244e+216 | 8 |4.545122221804089e+206 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 1586312300.8341682 | 1 | 2.48524154948518e+114 | 0.1 | -8.613287731540227e+118
- 50 |-3.528462156663725e+78 | 2 |1.2700080311616126e+106 | 1.0 |-2.372626959404846e+211
- 100 |1.918931739387602e+106 | 4 |4.837107877148766e+102 | 10.0 |nan
- 200 | 7.171272302438429e+136 | 8 | 4.8774820038862314e+101 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |1.0037655470356235e+211 | 1 |9.265012245041102e+216 | 0.1 |2.568584262099785e+213
- 50 | 5.780276353383284e+211 | 2 | -6.014424556016512e+213 | 1.0 | nan

```
100 |2.675782384307962e+213 | 4 |4.623375895693051e+211 | 10.0 |nan
200 |2.3801239736057623e+217 | 8 |1.8243548133165008e+207 | 100.0 |nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-4793979486.172105 | 1 |8.316682554577971e+105 | 0.1 |-1.7340009822518483e+104

50 |2.7689020592554265e+87 | 2 |-2.0511130582940814e+113 | 1.0 |2.0976678569285316e+207

100 |1.6676593256187987e+115 | 4 |4.633462181563116e+105 | 10.0 |nan

200 |5.276484221470446e+139 | 8 |2.4297282165024557e+105 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.0141356777924804e+208 | 1 |4.083025005703933e+218 | 0.1 |-6.697944554586975e+214

50 |-4.183565232281659e+210 | 2 |1.171122082931671e+214 | 1.0 | nan

100 |8.026833611479678e+212 | 4 |2.928483839824136e+209 | 10.0 | nan

200 |8.81775679880251e+217 | 8 |-5.449544473416421e+206 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.1274260378534926e+33 | 1 |4.268182736772302e+115 | 0.1 |1.1234761122270622e+110

50 |2.932262852514874e+73 | 2 |9.813747114328925e+112 | 1.0 |1.4965564849988106e+214

100 |-7.844988838878303e+103 | 4 |-6.247152286555251e+110 | 10.0 |nan

200 |6.35152029550069e+140 | 8 |-1.3522408970870843e+102 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1.230856464234532e+210 | 1 |6.381550906825645e+216 | 0.1 |2.2615564394475886e+213

50 |1.2812129304732847e+210 | 2 |6.221479821638222e+211 | 1.0 | nan

100 |1.4262026509901212e+215 | 4 |-6.2414197216768884e+209 | 10.0 | nan

Table: Training accuracies with different hyper-parameters n Train Accuracy | d Train Accuracy | eta Train Accuracy 10 |9.463172948959124e+23 | 1 |4.545580875819461e+106 | 0.1 |9.257072174576317e+99 50 |2.763597412547109e+84 | 2 |4.824020828059737e+113 | 1.0 |6.976346928108106e+201 100 | 2.458482467043733e+113 | 4 | 4.3905100992513477e+108 | 10.0 | -2.9226632773053035e+300 200 | 4.789984752701201e+140 | 8 | 1.9293768070774775e+103 | 100.0 | nan Table: Test accuracies with different hyper-parameters n Train Accuracy | d Train Accuracy | eta Train Accuracy 10 | 2.4856409122087888e+210 | 1 | 3.038863129977156e+216 | 0.1 | -8.054205714456736e+214 50 |-1.3301475080717356e+211 | 2 |-1.9630716055201428e+214 | 1.0 | nan 100 | 2.477363850573087e+214 | 4 | -1.1126160402255168e+212 | 10.0 | nan 200 |1.770181550703144e+220 | 8 |5.021427897507678e+207 | 100.0 |nan Table: Training accuracies with different hyper-parameters n Train Accuracy | d Train Accuracy | eta Train Accuracy 10 |2.5024802782000747e+23 | 1 |2.375165063901204e+115 | 0.1 |2.5496372619890895e+102 50 | 1.6467706341591498e+76 | 2 | -6.423413840593868e+107 | 1.0 | 5.436083507690072e+200 100 |2.0811170159144658e+109 | 4 |1.5566965757356198e+107 | 10.0 |nan 200 |-1.2761135426690757e+141 | 8 | 2.3205364822257557e+102 | 100.0 | nan Table: Test accuracies with different hyper-parameters n Train Accuracy | d Train Accuracy | eta Train Accuracy 10 |-4.4870359346120733e+210 | 1 |2.1759966972141229e+217 | 0.1 |5.0437618866491745e+213 50 | 3.7395091212551503e+211 | 2 | -1.2203785366082375e+213 | 1.0 | nan

100 |-7.530891666344876e+214 | 4 | 1.0712069419134105e+212 | 10.0 | nan

200 |1.1512220007191568e+217 | 8 |1.0616987092027706e+208 | 100.0 |nan

```
Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 180642133.60725474 | 1 | -4.2776235568409354e+120 | 0.1 | 7.309369393055415e+109

50 | 1.8663553612269406e+79 | 2 | 1.9875572522386216e+113 | 1.0 | -7.2595159075958415e+211

100 | 6.534645882876218e+106 | 4 | -3.1287467673240004e+103 | 10.0 | nan

200 | 2.8206267817815265e+137 | 8 | -2.1975013977608078e+101 | 100.0 | nan
```

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-2.810126781564308e+210 | 1 |-1.8338606480109386e+218 | 0.1 |-5.797468387307523e+213

50 |2.0124360891240184e+213 | 2 |5.001045589126764e+215 | 1.0 |nan

100 |-7.736169817597755e+212 | 4 |1.7920539390079883e+209 | 10.0 |nan

200 |9.425193629791585e+216 | 8 |4.0571723920307434e+208 | 100.0 |nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-4.297453500405771e+29 | 1 |1.2779856434424265e+114 | 0.1 |3.363489014477811e+114

50 |5.061914233503368e+73 | 2 |-3.6100856962245572e+112 | 1.0 |1.77885898646992e+214

100 |1.7194671106111564e+114 | 4 |2.7966726163805136e+108 | 10.0 |nan

200 |-1.5277714699669322e+140 | 8 |-2.41944922114597e+108 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.2417820504420954e+210 | 1 |-2.3634029207321836e+220 | 0.1 |9.468875952291304e+213

50 |9.223161196613771e+211 | 2 |2.568831871387737e+215 | 1.0 |nan

100 |5.435230415159559e+213 | 4 |4.860984283347268e+211 | 10.0 |nan

200 |5.452838649413212e+217 | 8 |6.589560352848724e+206 | 100.0 |nan

```
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |5.773820805604853e+23 | 1 |1.8142959773840674e+118 | 0.1 | 2.0981696536407788e+102
50 |1.5168972049887213e+84 | 2 |1.715324889101169e+113 | 1.0 |-2.485563815923274e+211
100 | 1.5771005645757826e+104 | 4 | 7.540422511446602e+109 | 10.0 | 5.799871841313753e+307
200 |3.0987144732049094e+145 | 8 |2.891342152248225e+103 | 100.0 |nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |4.475495849583765e+209 | 1 |5.022491001853893e+216 | 0.1 |1.354848961647384e+213
50 |-3.181577098240367e+211 | 2 | 2.168836909650311e+213 | 1.0 | nan
100 |4.497628258161258e+214 | 4 |2.806125003213243e+210 | 10.0 |nan
200 |3.920384173466373e+216 | 8 |1.1160408457585735e+207 | 100.0 |nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |1.960212568244029e+38 | 1 |4.052583161313552e+112 | 0.1 |1.7375241324327423e+115
50 |5.297694199102047e+86 | 2 |9.416960958602079e+109 | 1.0 |1.4771073335162112e+214
100 |-1.7917353635961024e+114 | 4 |-1.0250994441682056e+101 | 10.0
```

```
1.0563685800165717e+305
200 | 2.001057447711207e+137 | 8 | 5.262550918387536e+107 | 100.0 | nan
```

```
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |-3.9942699359746136e+209 | 1 |1.4463142205200143e+217 | 0.1 |-9.291799311422099e+214
50 |-1.9873213353826429e+214 | 2 | 6.400581237370447e+213 | 1.0 | nan
100 |-3.1933169883082972e+212 | 4 |4.564996025064154e+212 | 10.0 |nan
200 |-1.0703040577447539e+218 | 8 |1.1664999886531881e+207 | 100.0 | nan
```

```
Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1512511410533.029 | 1 |4.79537621056658e+112 | 0.1 |6.899254420299416e+108

50 |2.0000157941196543e+79 | 2 |6.037456694341677e+115 | 1.0 |1.7205155776975242e+213

100 |7.109898504393373e+105 | 4 |-1.2673770150823505e+109 | 10.0 |nan

200 |2.395761124962038e+140 | 8 |8.06841149006814e+101 | 100.0 |nan
```

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-7.039959206880416e+209 | 1 |-4.662824665723458e+218 | 0.1 | 1.3687533394217064e+214

50 |-1.5239093434912065e+211 | 2 |1.9746016908132543e+215 | 1.0 | nan

100 |6.57289027778544e+214 | 4 |9.546795525015412e+209 | 10.0 | nan

200 |3.52068871240161e+217 | 8 |2.7104980107370363e+207 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-4.757333660277977e+19 | 1 |-2.493302719685074e+119 | 0.1 |5.297566298206638e+118

50 |3.441938104548407e+73 | 2 |6.971677304369064e+108 | 1.0 |6.529829388378185e+209

100 |2.3618327705620883e+108 | 4 |1.5389446920362367e+111 | 10.0 |-inf

200 |-1.5655915078449812e+140 | 8 |-4.575118736050669e+101 | 100.0 |nan

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2.7937239811708937e+211 | 1 |-2.5547344981198294e+218 | 0.1 |-6.493971182166055e+214

50 |4.333990269255578e+212 | 2 |1.1323905096225124e+213 | 1.0 |nan

100 |2.890184101498187e+215 | 4 |1.6870586344780237e+209 | 10.0 |nan

200 |-1.4239707844932668e+217 | 8 |-3.613538886357251e+206 | 100.0 |nan
```

Table: Training accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 |2312686825602.6743 | 1 |2.3615046593456623e+116 | 0.1 |-2.6167826761824895e+103
50 |-9.665694780116781e+80 | 2 | 3.147524702629351e+105 | 1.0 | 1.265330827004492e+211
100 |-9.451676505277336e+112 | 4 |-3.774923747467878e+104 | 10.0 | nan
200 |-1.0223750724276194e+139 | 8 |3.1617015821317307e+105 | 100.0 | nan
Table: Test accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 7.228808292030386e+210 | 1 | 3.654628648892706e+218 | 0.1 | 1.4453859509763066e+211
50 | 6.164551523922901e+211 | 2 | -6.060894727779879e+215 | 1.0 | nan
100 | 7.909958870814523e+214 | 4 | 3.244331707193799e+211 | 10.0 | nan
200 |9.560147529481475e+217 | 8 |-2.6269562777609943e+207 | 100.0 |nan
Table: Training accuracies with different hyper-parameters
n Train Accuracy | d Train Accuracy | eta Train Accuracy
10 | 16.534368868192804 | 1 | -1.4028369261034433e+116 | 0.1 | | 3.0832049148270723e+107
50 | 9.544258390804004e+81 | 2 | 1.1027677029729915e+107 | 1.0 | 1.5827510704368958e+207
100 |3.5079513433247546e+111 | 4 |2.821300147159528e+103 | 10.0 |nan
200 | 6.357842045279456e+136 | 8 | 1.0323893014230589e+107 | 100.0 | nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.23864905923315e+208 | 1 | 1.6492880999057154e+217 | 0.1 | 1.7221338817334472e+213

50 | -9.631078185999422e+211 | 2 | 5.2711273225207244e+212 | 1.0 | nan

100 | 5.693006497562238e+215 | 4 | 4.323632763919489e+209 | 10.0 | nan

200 | 2.7735465228963215e+216 | 8 | 4.1193525894004835e+206 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

```
10 | 31629653.54722107 | 1 | 4.9424364600594764e+119 | 0.1 | -9.384067921392853e+115
```

- 50 | 3.866392810036961e+73 | 2 | -4.185522755792585e+117 | 1.0 | 6.732083600110247e+205
- 100 |-5.881020461152334e+109 | 4 |1.1884651114275092e+110 | 10.0 |2.468580853090591e+307
- 200 |-3.7994055507195297e+136 | 8 |-2.0453554329020384e+102 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 |2.117576602466677e+209 | 1 |3.3534994258753144e+214 | 0.1 |-2.2367060599806936e+215
- 50 |1.6778877199291408e+212 | 2 |1.143044456416592e+214 | 1.0 |nan
- 100 |2.5138832825745677e+215 | 4 |1.2431418242379432e+210 | 10.0 | nan
- 200 |5.664905805458244e+217 | 8 |1.5603370402776056e+206 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 3.2852567218469663e+19 | 1 | -6.812532087184896e+117 | 0.1 | 1.791128100069256e+112
- 50 |-1.3599801224507158e+78 | 2 | 4.758655038938794e+109 | 1.0 | 3.3548720979853076e+200
- 100 |-3.159104976751027e+116 | 4 | 1.0258996756054082e+108 | 10.0 | 5.813304379322257e+304
- 200 |3.205064113158169e+141 | 8 |-2.5836547481311277e+105 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 6.861775420881827e+208 | 1 | 2.8415752034524604e+218 | 0.1 | 4.8868458162785736e+215
- 50 | 2.4313958147001828e+213 | 2 | -7.949033916957899e+212 | 1.0 | nan
- 100 |-2.748847375367414e+214 | 4 |-1.6477711913566989e+212 | 10.0 | nan
- 200 |-9.62897424341301e+217 | 8 |-2.023940752827107e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |222210838589.31702 | 1 |1.048498682202552e+115 | 0.1 |1.3688696322466742e+109

```
50 |4.331434069256869e+68 | 2 |-2.0447571514836e+107 | 1.0 |2.4957238892139768e+206

100 |5.274163067686632e+100 | 4 |-6.538832571261431e+102 | 10.0 |nan

200 |1.031249162317036e+134 | 8 |-9.862676818049747e+102 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 |1.0991785244859063e+211 | 1 |2.018629486284991e+218 | 0.1 |1.1666546792222745e+213
- 50 |-1.1556324470655328e+211 | 2 | 3.6610635816492964e+213 | 1.0 | nan
- 100 | 1.869850829829545e+212 | 4 | -2.7752181031330745e+210 | 10.0 | nan
- 200 | 9.41827661060726e+218 | 8 | 4.9963895597982694e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 | 34486.99553457892 | 1 | 7.971186299368589e+108 | 0.1 | 1.962894937549345e+113
- 50 | 5.3682770757674206e+79 | 2 | 1.3274255745294257e+111 | 1.0 | 1.4262489057588542e+208
- 100 |8.087157865994455e+112 | 4 |3.288654377702259e+111 | 10.0 |nan
- 200 |1.0189532117848103e+142 | 8 |6.628621549504055e+105 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy
```

- 10 | 7.24046685105125e+207 | 1 | 1.3261402344818238e+216 | 0.1 | 5.795881679561243e+215
- 50 | 7.180892594247852e+209 | 2 | 6.798717609946388e+212 | 1.0 | nan
- 100 | 5.208894669842217e+214 | 4 | 1.536252413110984e+211 | 10.0 | nan
- 200 | 2.8640681784164634e+218 | 8 | 1.6515416495739516e+206 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |0.2819572084565329 | 1 |1.5209556191952232e+109 | 0.1 |-3.539851436559606e+108
- 50 |1.2080233555974786e+76 | 2 |-2.0370980783508147e+107 | 1.0 |5.0275062602879866e+206

```
100 |3.0759995681514826e+104 | 4 |9.39016043319223e+103 | 10.0 |-inf
200 |-6.37160051823048e+141 | 8 |2.8280928663633546e+103 | 100.0 |nan
```

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-1.789194054737817e+210 | 1 |5.653988483925868e+219 | 0.1 |-8.424980555228248e+214

50 |1.0420787746382297e+210 | 2 |2.9258858299320865e+213 | 1.0 | nan

100 |3.254590873259859e+212 | 4 |3.758755946023058e+209 | 10.0 | nan

200 |-9.410806117007835e+216 | 8 |4.922142003006977e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-111030989195.0353 | 1 |1.6605394849938873e+108 | 0.1 |2.647043679342675e+112

50 |2.9630071456308273e+69 | 2 |7.771493058438369e+105 | 1.0 |8.629389966108618e+213

100 |3.0751777888999723e+113 | 4 |-2.6413837866338894e+103 | 10.0 |nan

200 |4.147782675843174e+143 | 8 |1.8626416759119118e+100 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.2082690441551187e+209 | 1 | 2.074987615257864e+218 | 0.1 | 9.320842998156603e+211

50 | -3.095807529458024e+210 | 2 | 1.0061978904055831e+213 | 1.0 | nan

100 | 5.1896201894310066e+212 | 4 | 4.6076555325565584e+210 | 10.0 | nan

200 | 6.4100381449629616e+218 | 8 | -9.8459806547834e+209 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 0.39946545374224174 | 1 |-1.3750336711125222e+108 | 0.1 | 1.195464822638583e+106

50 | 1.0298996934812005e+86 | 2 | 1.0527322028949962e+110 | 1.0 | 2.8432728670152656e+204

100 | 5.8123611858801455e+113 | 4 | 9.971545739206162e+100 | 10.0 | 2.243725905236675e+301

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.5494631968652987e+210 | 1 | 1.3515686151304811e+219 | 0.1 | -3.023722795230347e+213

50 | 2.05627558454757e+212 | 2 | 2.1670934641196004e+212 | 1.0 | nan

100 | -7.427742822466881e+213 | 4 | 1.0110191656431314e+210 | 10.0 | nan

200 | 1.0454333739952234e+217 | 8 | 1.8018362537823652e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.0173766401275547e+17 | 1 |7.377284841675986e+119 | 0.1 |6.12359667238757e+108

50 |-8.953539959263947e+85 | 2 |1.0609083110224302e+104 | 1.0 |-1.0978898000646534e+216

100 |1.6412858732066194e+108 | 4 |-4.431563737879841e+105 | 10.0 |nan

200 |1.0558853839212934e+139 | 8 |6.669058297244642e+104 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-2.07176904540019e+210 | 1 |4.847590308635903e+217 | 0.1 |3.501520344524358e+214

50 |2.932680612646422e+213 | 2 |1.5005307381745495e+216 | 1.0 |nan

100 |2.4051722639317367e+213 | 4 |7.869817860774859e+210 | 10.0 |nan

200 |-1.2822745966436432e+217 | 8 |1.859194279106361e+206 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 7607657681.959407 | 1 | 2.3523304148498917e+117 | 0.1 | 1.3424227092022626e+113

50 | 1.2510294253402544e+87 | 2 | 1.8626011116782328e+112 | 1.0 | -3.4252774504026406e+214

100 | 4.333494006966124e+110 | 4 | 5.508926259686591e+104 | 10.0 | 1.0718833349534291e+306

200 | -1.7456151715758696e+139 | 8 | 4.852648268757867e+101 | 100.0 | nan

```
Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.4847756700443987e+208 | 1 | 3.0491365353730256e+219 | 0.1 | 1.5878848054884207e+215

50 | -2.351295907593162e+213 | 2 | 5.396936227780599e+215 | 1.0 | nan

100 | 1.944168495438501e+214 | 4 | 2.8398685635458535e+210 | 10.0 | nan

200 | 2.536377354056239e+219 | 8 | -1.2459479069179761e+209 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.34279531467458e+23 | 1 | 2.676343878117755e+114 | 0.1 | 2.2507451555428074e+109

50 | 2.6925428089427353e+77 | 2 | 4.635851101467152e+112 | 1.0 | -3.1150323024469405e+211

100 | 1.5780946079654223e+110 | 4 | 1.466406613410248e+100 | 10.0 | 7.303308756353538e+305

200 | 1.7255405787286054e+136 | 8 | 3.126865905445952e+104 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-8.224081940224896e+209 | 1 |8.203245763937687e+217 | 0.1 |5.6825041335030605e+212

50 |3.937508283616992e+212 | 2 |-8.395452854425826e+214 | 1.0 |nan

100 |5.57091308492374e+215 | 4 |4.861488940297035e+208 | 10.0 |nan

200 |1.8332366619617454e+218 | 8 |-2.2694496879890996e+207 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |33.105582706219536 | 1 |1.5630491588013527e+115 | 0.1 |1.4727007957547217e+112

50 |-6.3414889009447405e+78 | 2 |6.199105835058454e+113 | 1.0 |-9.307304647200071e+208

100 |1.477835025061924e+111 | 4 |-1.5295463149263359e+106 | 10.0 |-1.74294270221403e+305

200 |-1.3115603084634156e+142 | 8 |-4.77009194416044e+106 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.873972668316769e+209 | 1 | 1.373546009524462e+218 | 0.1 | 1.0578578638484961e+215

50 | 3.595468240434825e+211 | 2 | 7.539515897157456e+214 | 1.0 | nan

100 | -1.0162745197972116e+215 | 4 | 1.7153280802927605e+208 | 10.0 | nan

200 | 4.6618795191914155e+216 | 8 | -7.898400918184576e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |89994629695.42435 | 1 |-3.208314467281618e+114 | 0.1 |-1.2518958987789966e+105

50 | 1.444738299903465e+82 | 2 | 3.619371359215702e+114 | 1.0 | 2.175857248653924e+201

100 |1.5897896290177855e+102 | 4 |-5.501833361503429e+105 | 10.0 |nan

200 | 2.047570016260969e+139 | 8 | 5.403400960668278e+103 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |8.848725321818371e+208 | 1 |3.3062178159867884e+218 | 0.1 |3.494100574486856e+215

50 |-7.115310991424298e+210 | 2 |-1.584765859958402e+215 | 1.0 | nan

100 |8.431010787221646e+213 | 4 |-1.0329736134021042e+210 | 10.0 |nan

200 | 4.395497729266238e+215 | 8 | -2.4751174069678843e+208 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-17152707.216563214 | 1 |-1.6465087566325106e+118 | 0.1 | 3.219298049499785e+112

50 |-4.265533157264016e+83 | 2 |1.917523908998881e+107 | 1.0 |7.5067469798538e+210

100 |-4.462915271504992e+110 | 4 |-3.0904895085645947e+111 | 10.0 |-inf

200 | 2.8629310726257233e+137 | 8 | 4.7756328206790796e+101 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

```
n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 4.068912961491508e+212 | 1 | 1.522667941803755e+217 | 0.1 | 1.6504300392110376e+215

50 | 6.412664311668106e+211 | 2 | 1.4034162141939654e+213 | 1.0 | nan

100 | 1.0585121870743924e+213 | 4 | 9.213106964507121e+210 | 10.0 | nan

200 | 1.8045832491496834e+217 | 8 | -1.0980292604829625e+207 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.1770998343497352e+17 | 1 |5.047352802684239e+114 | 0.1 |2.2696399534563454e+113

50 |6.268825050991161e+75 | 2 |1.2783235846402743e+107 | 1.0 |-3.001389098428917e+206

100 |-1.3074613842700667e+113 | 4 |1.1971839419182339e+110 | 10.0 |nan

200 |1.1661443975666693e+142 | 8 |3.4134063410387392e+103 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.62478106309587e+210 | 1 | -6.534151327883731e+218 | 0.1 | 2.8324925217693804e+214

50 | 8.2143060827167e+211 | 2 | 4.21448216383771e+215 | 1.0 | nan

100 | -9.58058361817666e+214 | 4 | 4.837453638750577e+211 | 10.0 | nan

200 | 3.085493673770858e+217 | 8 | -4.1975075109402567e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 4.435342061440804e+24 | 1 | -3.8811753084542345e+113 | 0.1 | 1.0901504632933053e+109

50 | 6.282695240051364e+80 | 2 | 1.1114834239119378e+115 | 1.0 | 9.633530399950132e+206

100 | 4.858703459778015e+105 | 4 | 4.069225306586355e+113 | 10.0 | nan

200 | -2.995684584941822e+137 | 8 | 5.834678622014509e+102 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 1.4619902258800357e+30 | 1 | 9.88961281654279e+112 | 0.1 | 4.986817586407131e+107

50 | 1.1339567821752384e+87 | 2 | -4.9300775127757725e+109 | 1.0 | 8.335699028630668e+207

100 | 2.860835552437352e+109 | 4 | 6.096607826792125e+102 | 10.0 | nan

200 | 4.446987731317298e+143 | 8 | 2.5358681834882754e+103 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |2.4284456088697287e+207 | 1 |-2.7094011360412828e+218 | 0.1 |4.973895400368286e+213

50 |1.488694399642186e+212 | 2 |2.0705802400736193e+214 | 1.0 |nan

100 |1.9588899193613342e+213 | 4 |1.8434709595352786e+210 | 10.0 |nan

200 |-5.13094594325114e+220 | 8 |2.4939525532758424e+209 | 100.0 |nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 | 2.1609609580098617e+31 | 1 | 1.0858514710929044e+105 | 0.1 | 1.5620475703756194e+106

50 | -7.859725662753783e+86 | 2 | -1.4128151751261687e+114 | 1.0 | -1.5439256686766505e+213

100 | -1.5995383708859058e+109 | 4 | 3.611190978164333e+102 | 10.0 | -inf

200 | 5.495569877393121e+138 | 8 | 1.441437064302413e+105 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |-9.740011772478286e+212 | 1 |9.381402300776995e+217 | 0.1 |2.4287051174030895e+215

```
50 |1.1246420752563472e+212 | 2 |4.885153678522617e+215 | 1.0 | nan
100 |8.1487792926290535e+214 | 4 |5.55319822077979e+210 | 10.0 | nan
200 |5.470372376975281e+217 | 8 |3.083254670672823e+207 | 100.0 | nan
```

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 | 3900377344491932.0 | 1 | -5.887775137223824e+112 | 0.1 | 3.006108223019421e+105
- 50 |-1.542943610570632e+77 | 2 |9.377051425520647e+112 | 1.0 |-1.1200379664711533e+209
- 100 | 4.5250197509263984e+111 | 4 | 1.8184681715117387e+103 | 10.0 | nan
- 200 |1.0016886119644676e+140 | 8 |2.8611343669399314e+107 | 100.0 |nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |3.226178796000382e+210 | 1 |2.1716421468530835e+216 | 0.1 |3.920901825295131e+213
- 50 | 4.801961978507288e+212 | 2 | -4.539338147523738e+214 | 1.0 | nan
- 100 |-3.740930037902427e+215 | 4 | 9.200630584344656e+208 | 10.0 | nan
- 200 |-2.59798310222858e+218 | 8 | 4.096517059904767e+207 | 100.0 | nan

Table: Training accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

- 10 |-1.8767451639943852e+18 | 1 |-3.7360565423263436e+111 | 0.1 |-4.9213704024168455e+107
- 50 | 7.184319948227954e+78 | 2 | -7.468730060892563e+101 | 1.0 | -1.5819334641347882e+204
- 100 |1.3258701633847002e+106 | 4 |2.0220198154728718e+109 | 10.0 |-inf
- 200 |-1.922588738481227e+142 | 8 | 2.3285122341524413e+101 | 100.0 | nan

Table: Test accuracies with different hyper-parameters

n Train Accuracy | d Train Accuracy | eta Train Accuracy

10 |1.6772170644314406e+208 | 1 |-3.2129071383124196e+218 | 0.1 |-5.470861587194502e+213

```
50 |9.442963359332107e+212 | 2 |7.346182358752401e+213 | 1.0 |nan
100 |1.153943092266797e+213 | 4 |7.771180621489425e+210 | 10.0 |nan
200 |-1.6000391726757255e+218 | 8 |4.3407632922284933e+207 | 100.0 |nan
2e)
```

The data that I seen in the tables is that I realized that the eta hyper parameter has a huge impact on the data points. It is because I seen they cause the training parameters to have high values than the cause of other hyper parameters. If the step size if very high, then the average of the w vector has a high value. Also, as the dimensions (d) increases, then the test data decreases. It is because when the vector w has more parameters, then it gets closer to the curve. The other thing we notice on the tables is that the more of the test case points can causes the averages to have a bigger value. If there are more amount of data points then there will be a bigger average.

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