

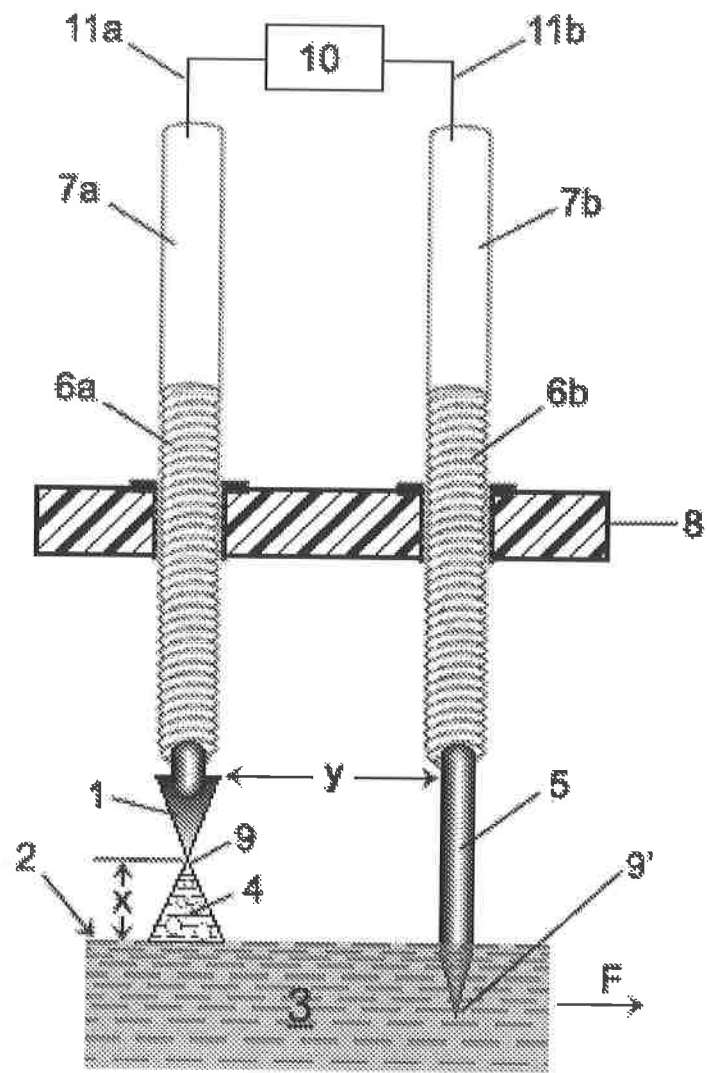


Figure 1a

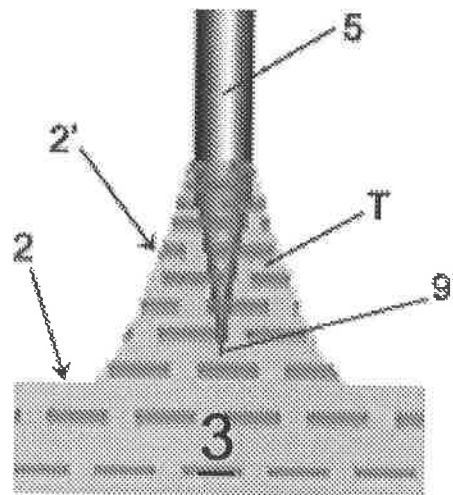


Figure 1b

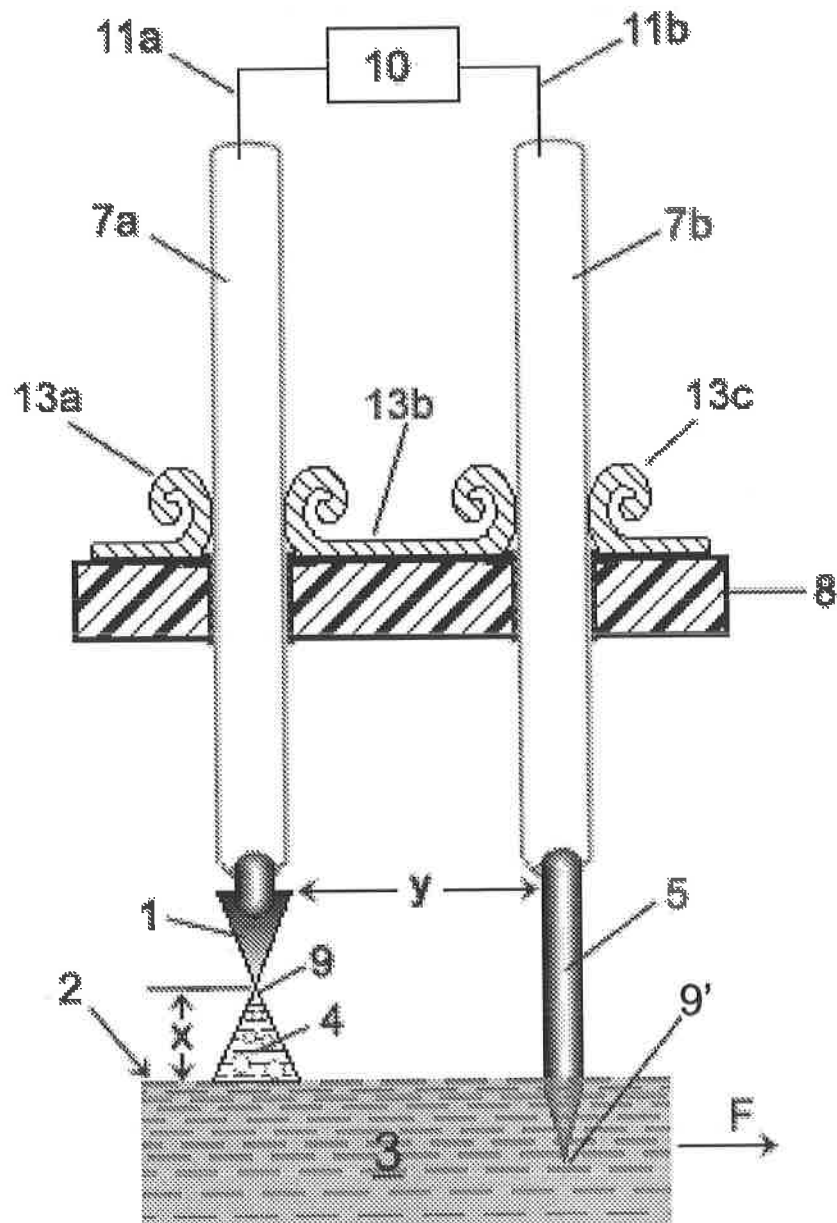


Figure 1c

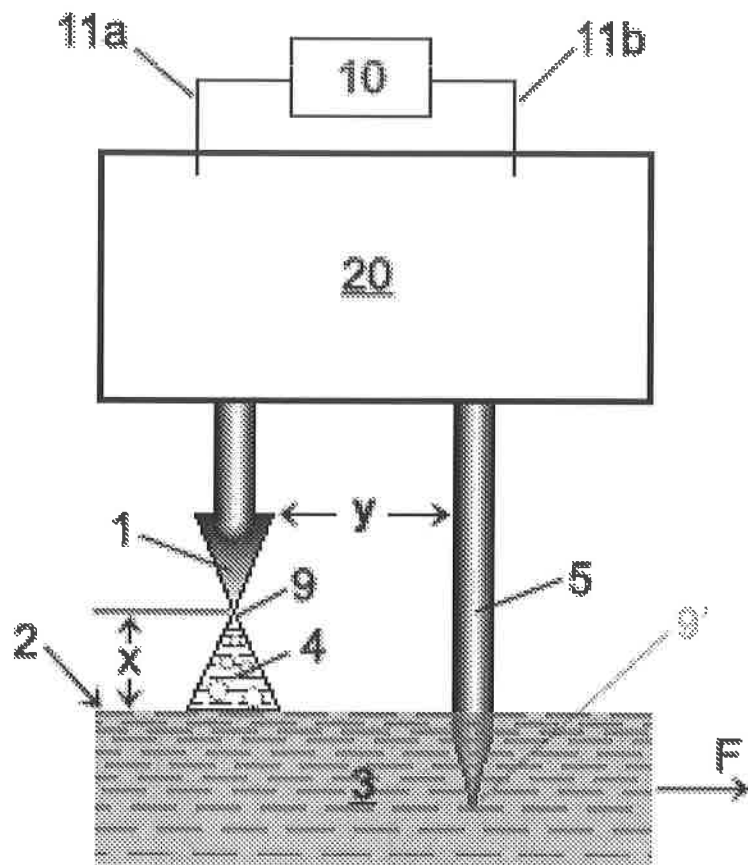


Figure 2a

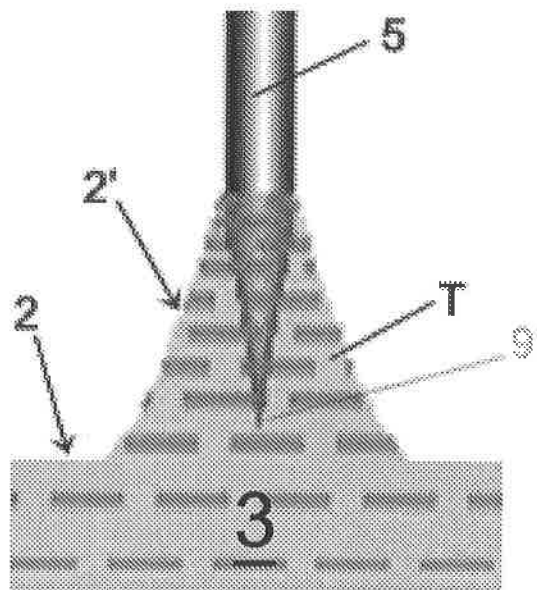


Figure 2b

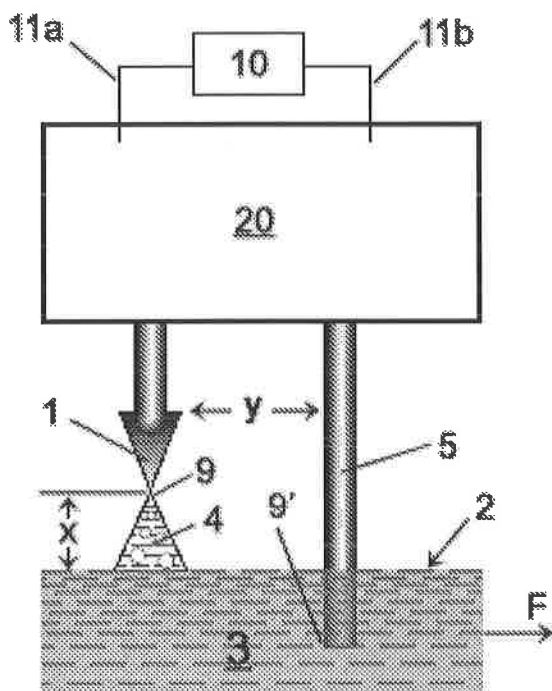


Figure 3a

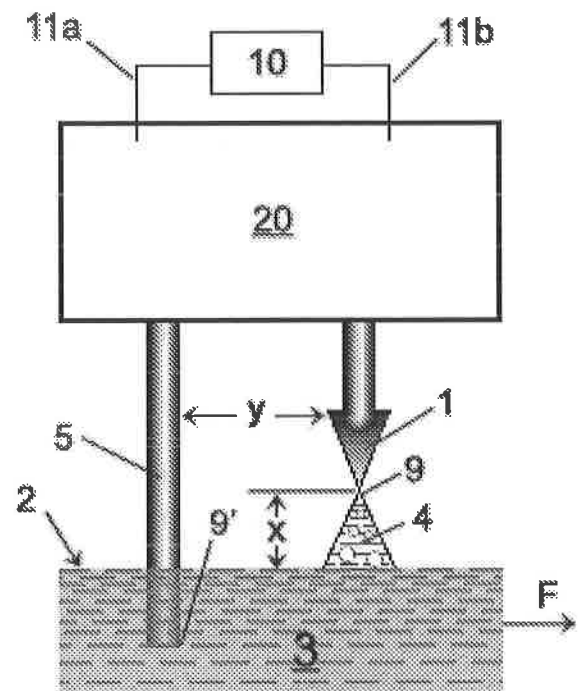


Figure 3b

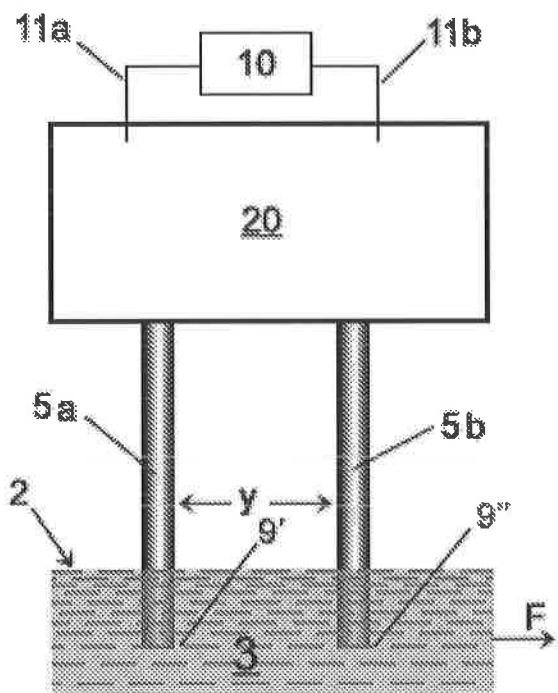


Figure 3c

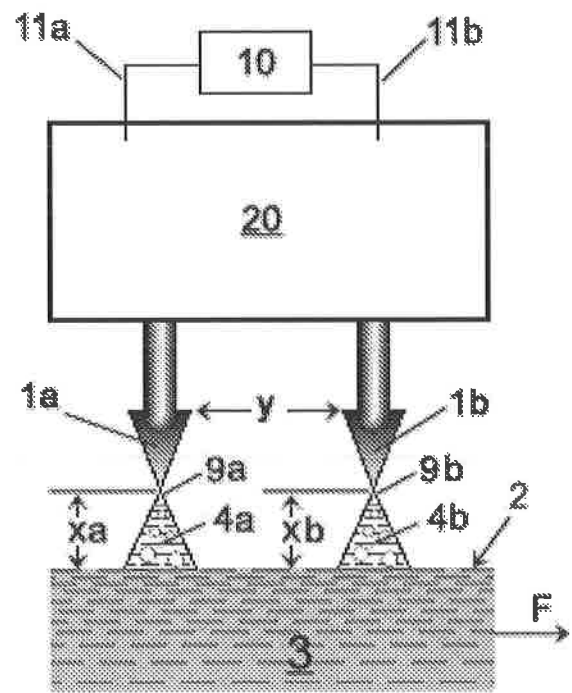


Figure 3d

Figure 4a

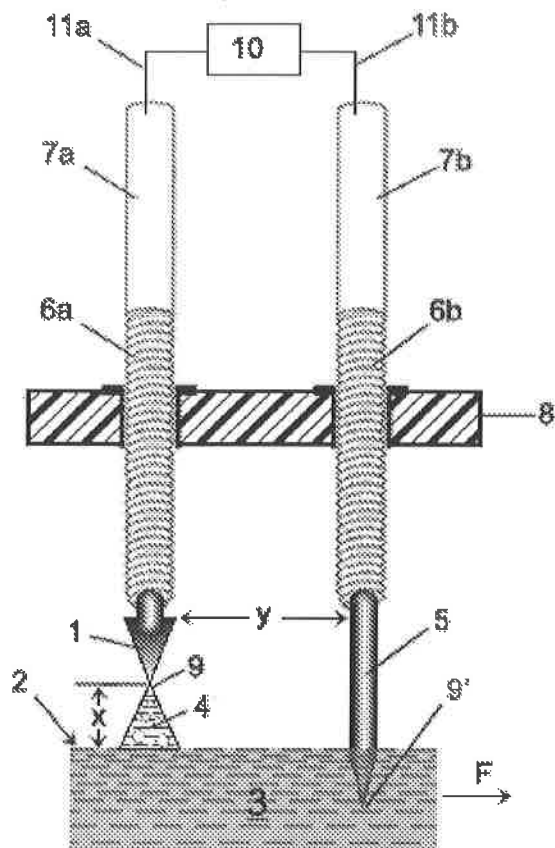


Figure 4b

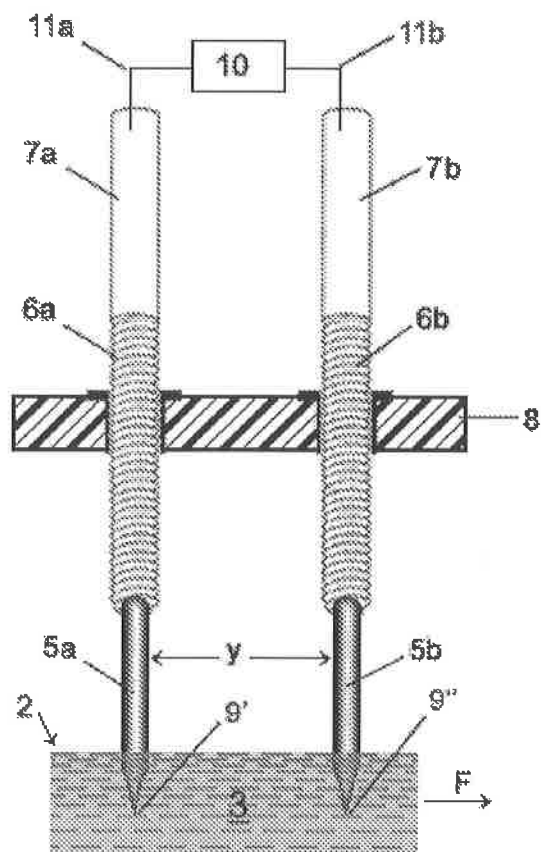
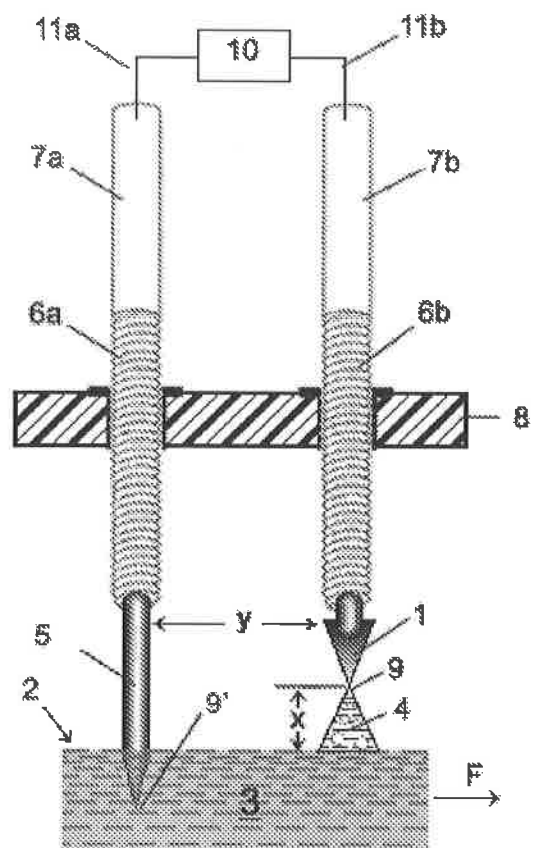


Figure 4c

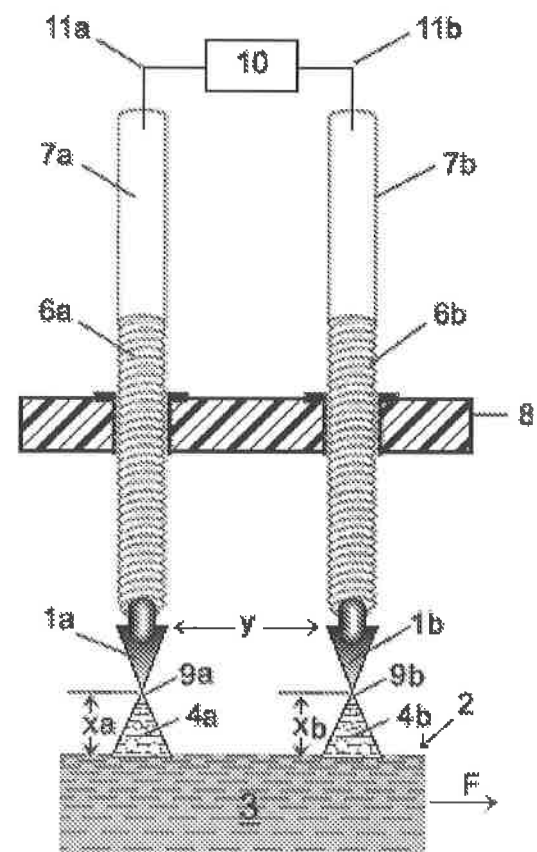


Figure 4d

Figure 5a



Figure 5b

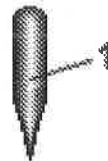


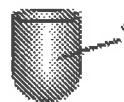
Figure 5c



Figure 5d



Figure 5e



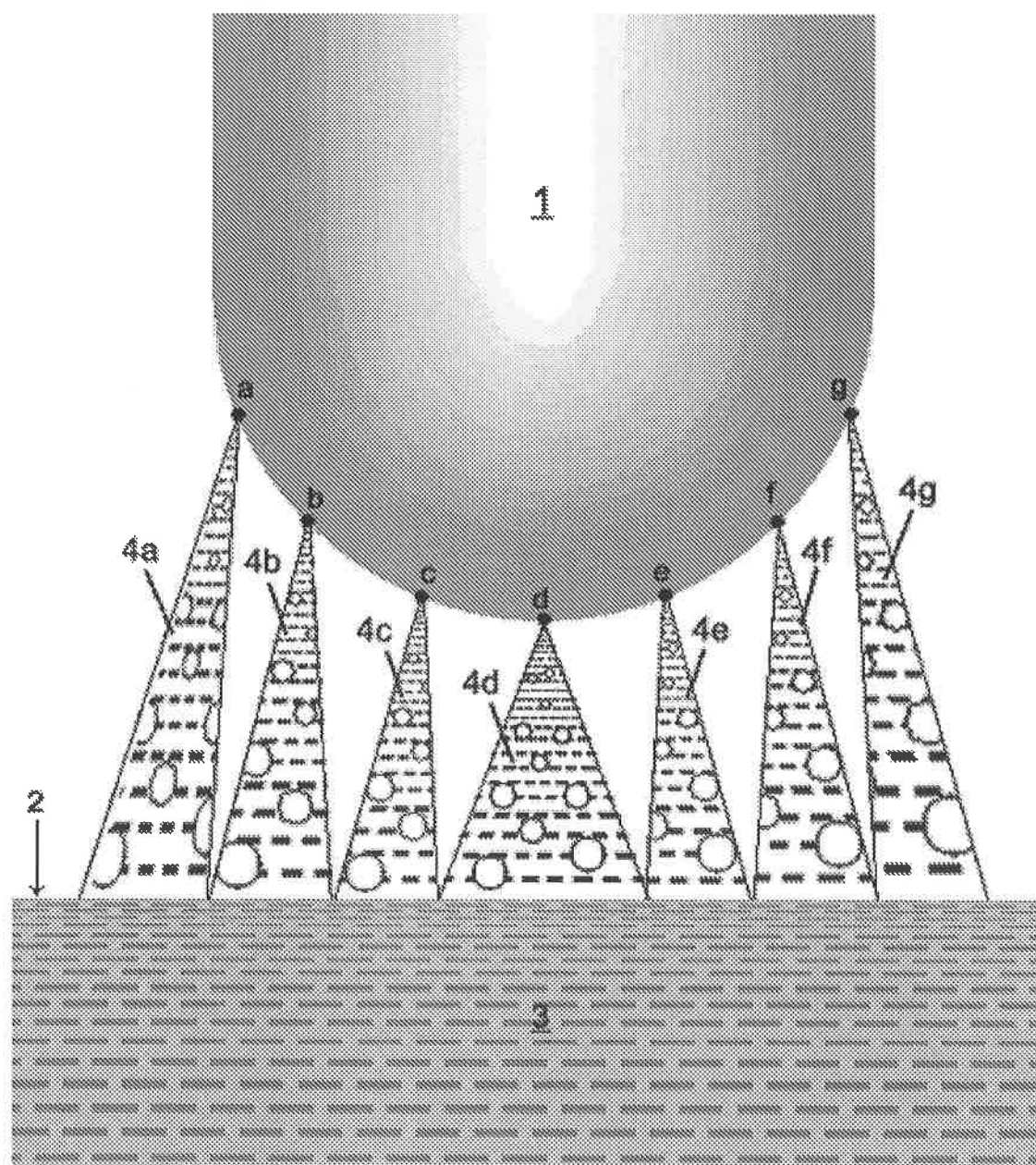


Figure 6

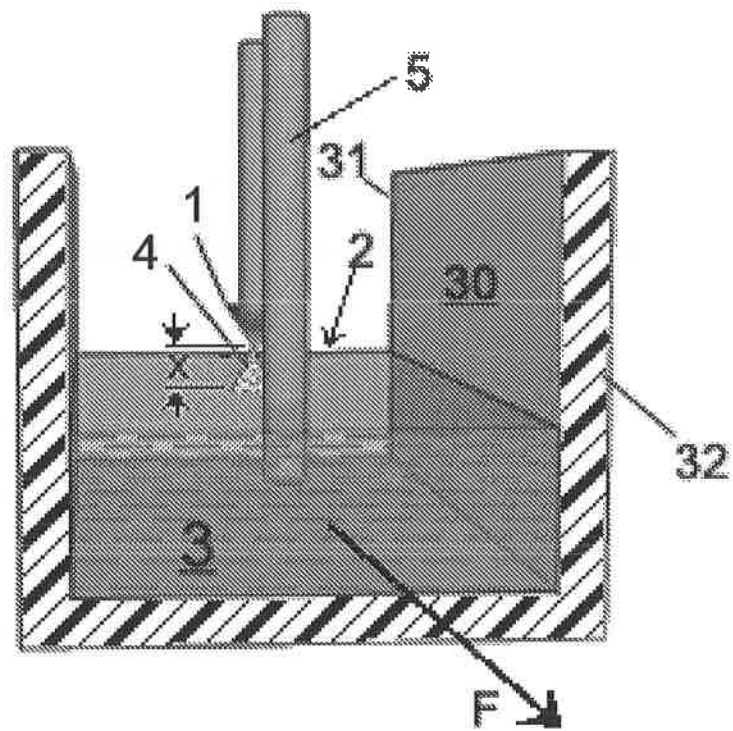


Figure 7a

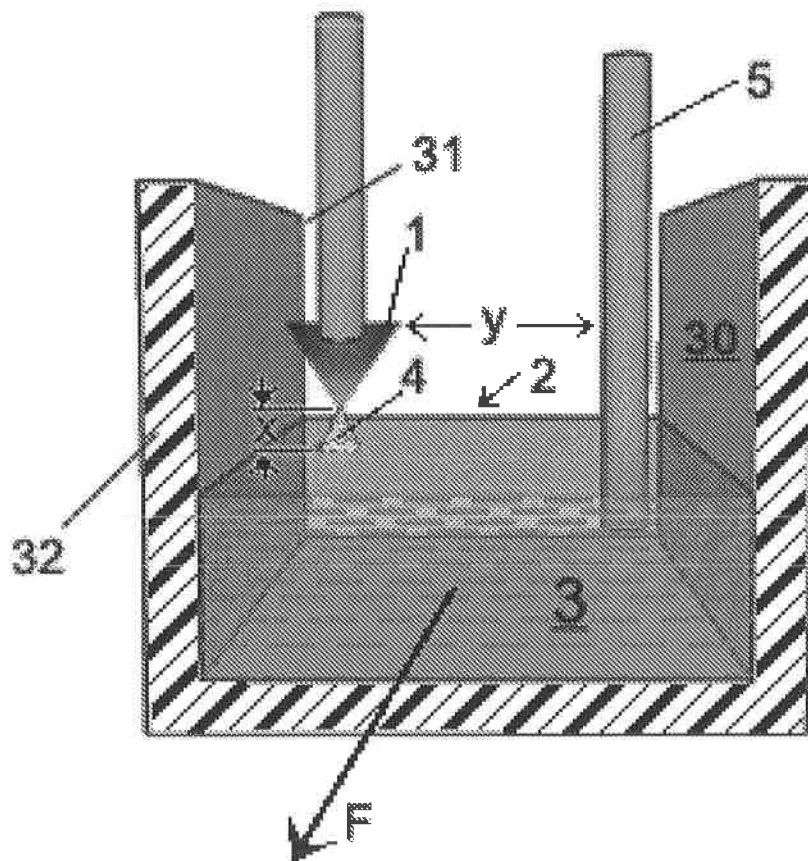


Figure 7b

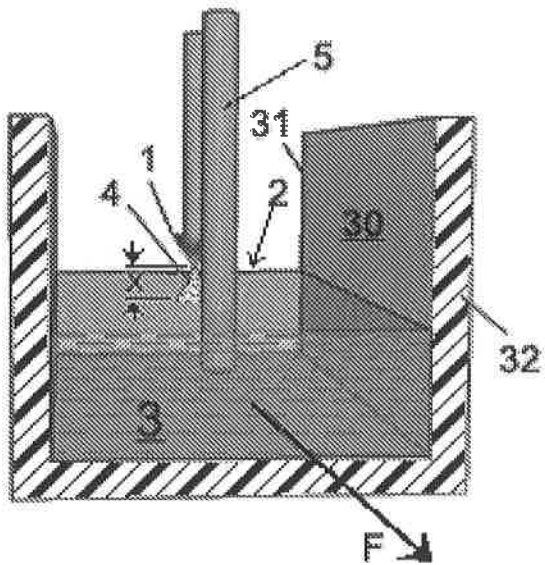


Figure 8a

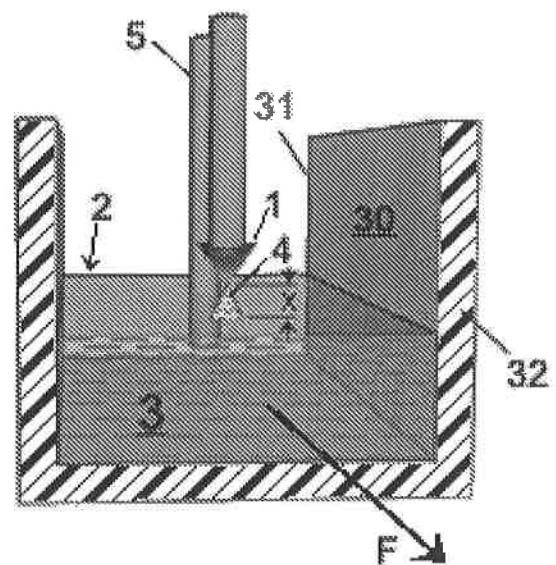


Figure 8b

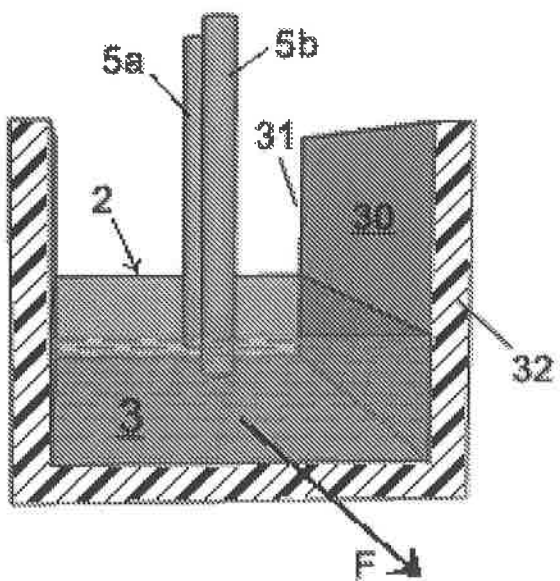


Figure 8c

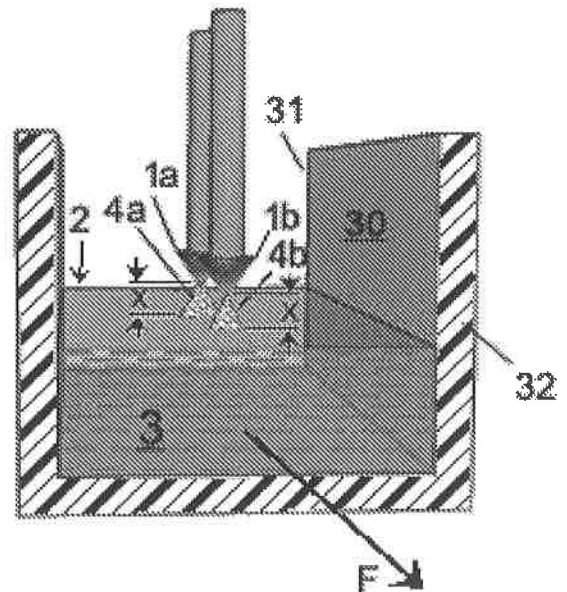


Figure 8d

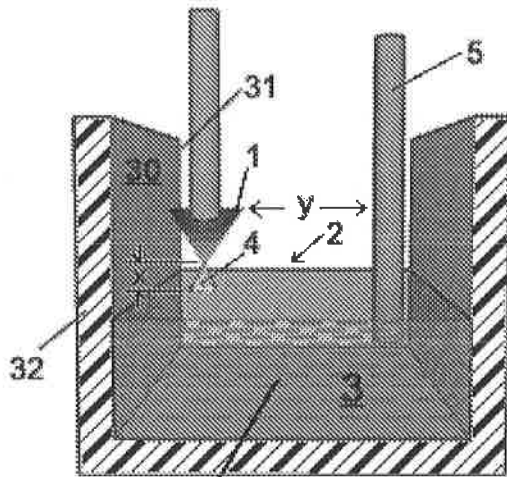


Figure 9a

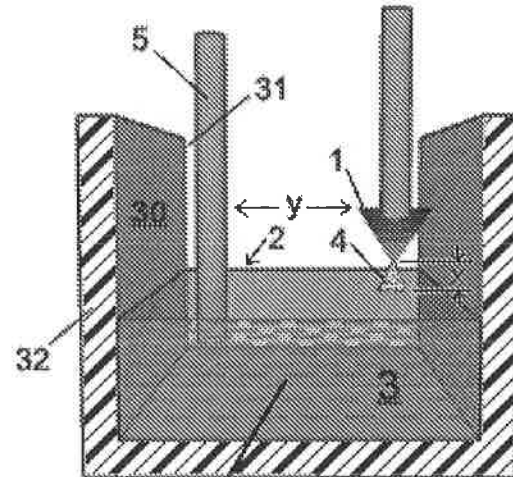


Figure 9b

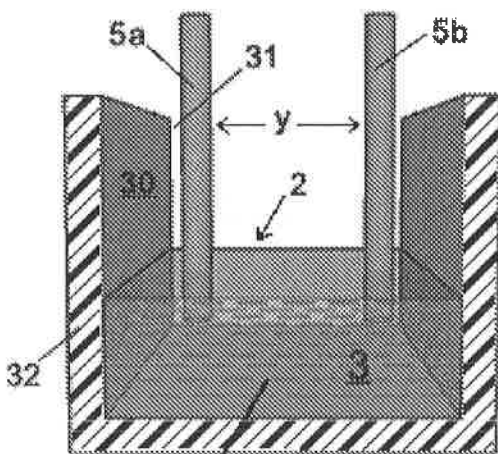


Figure 9c

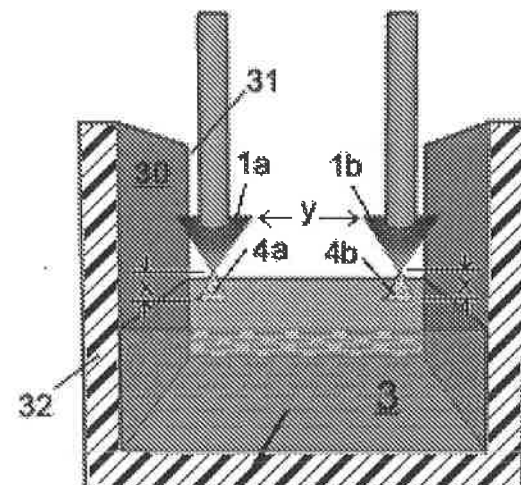


Figure 9d

Figure 10a

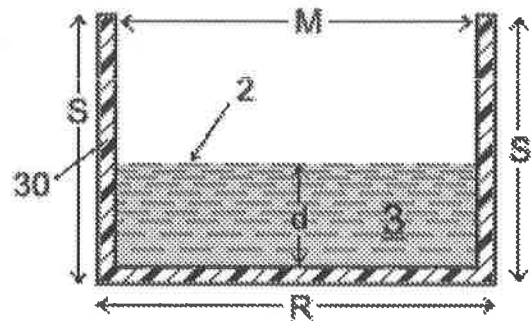


Figure 10b

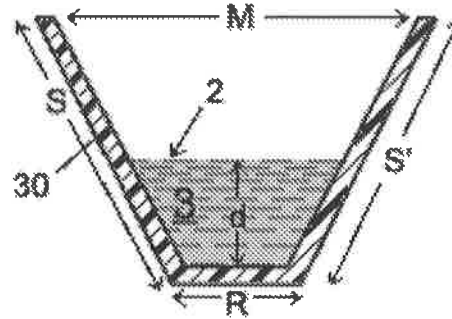


Figure 10c

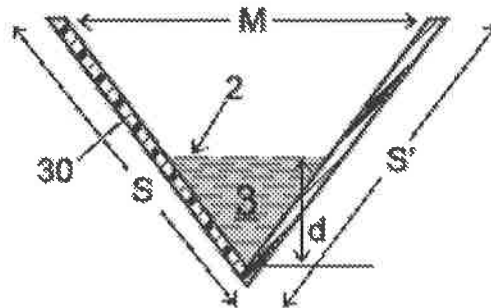


Figure 10d

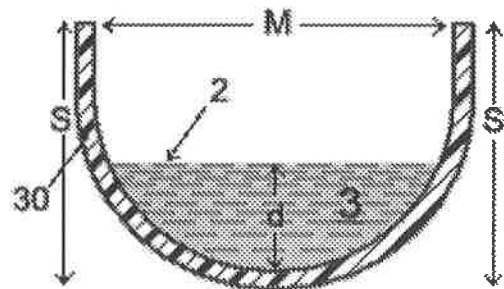
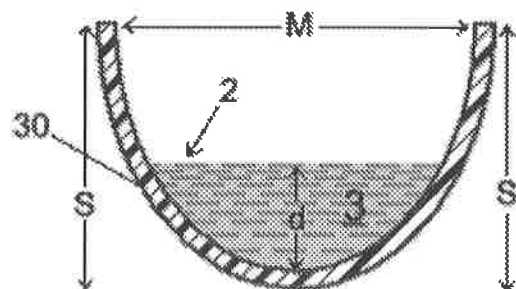
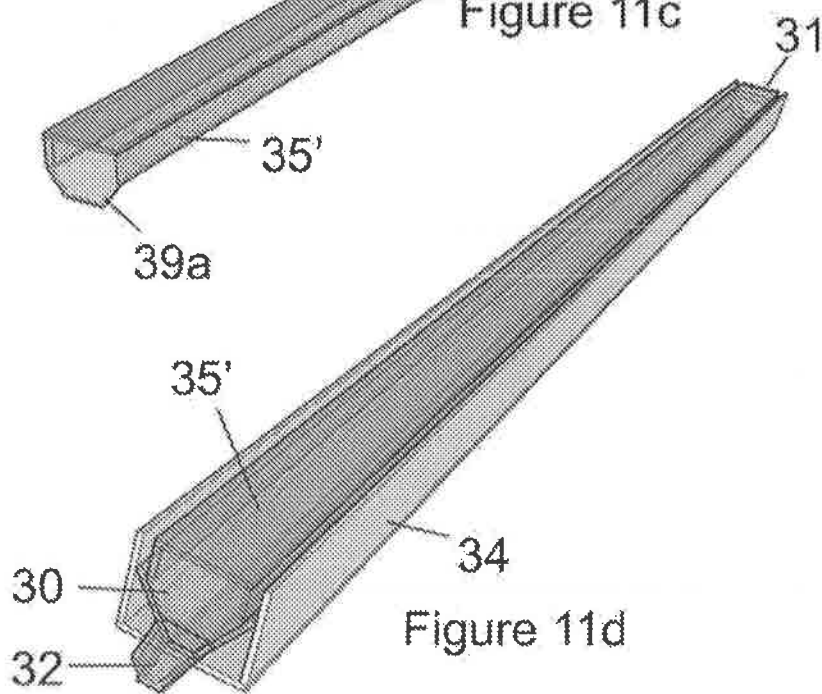
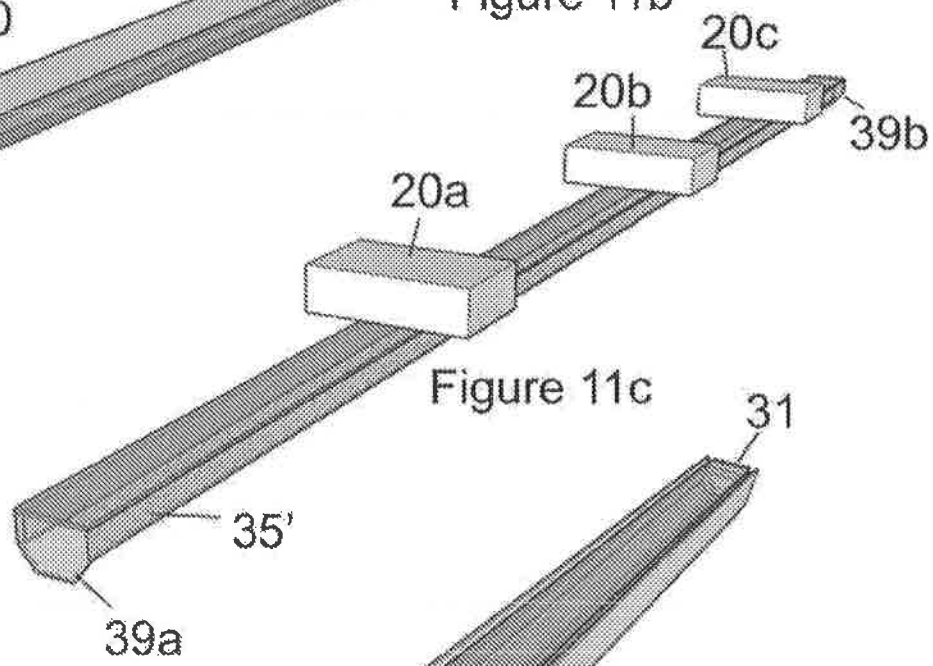
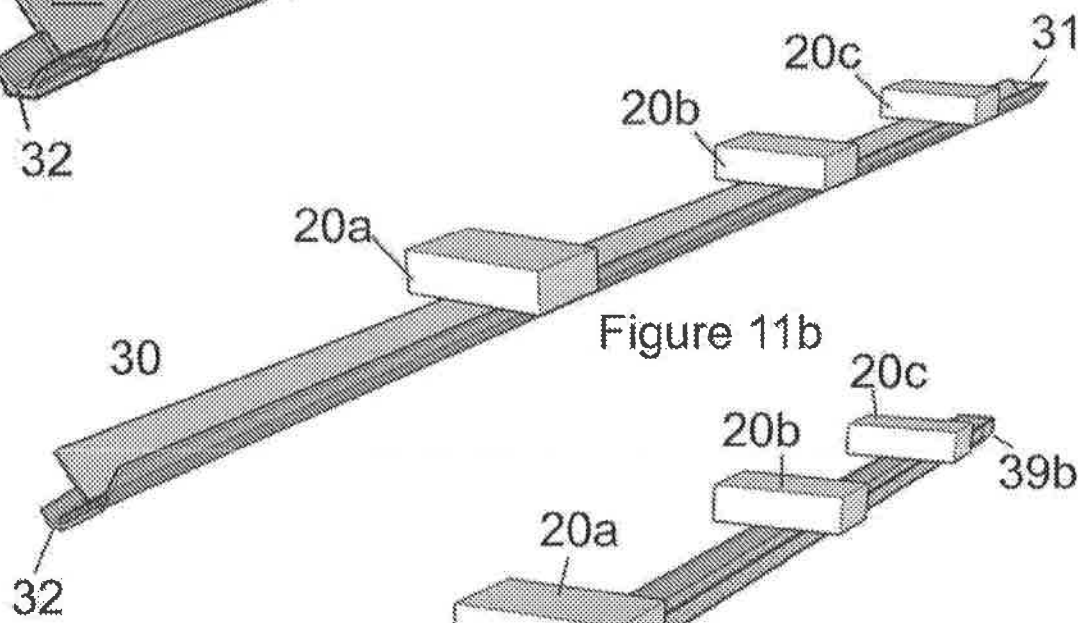
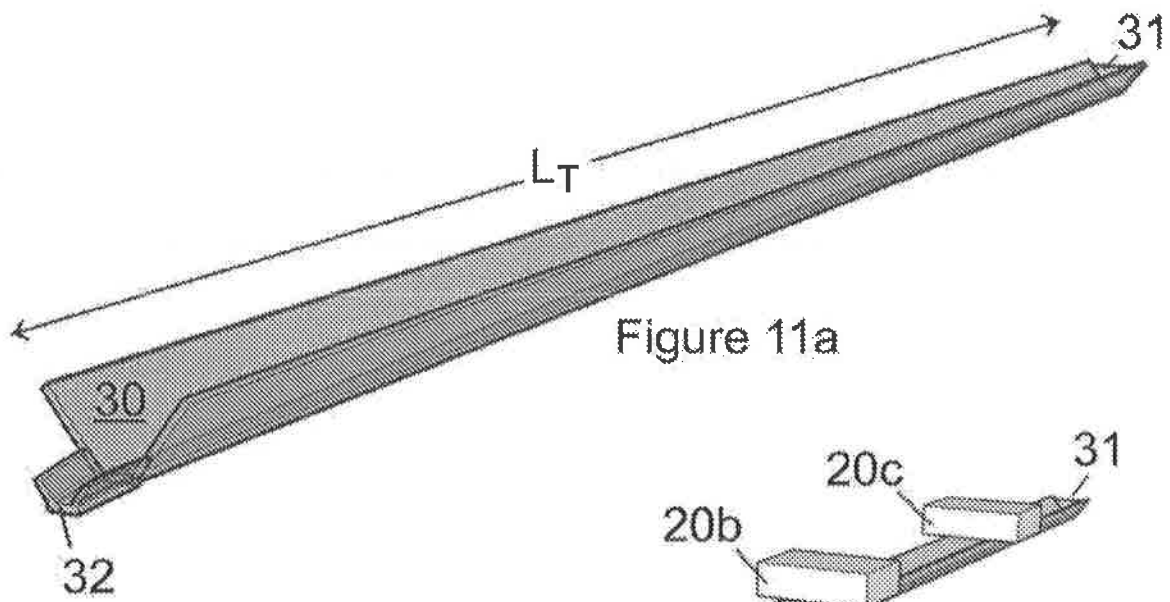


Figure 10e





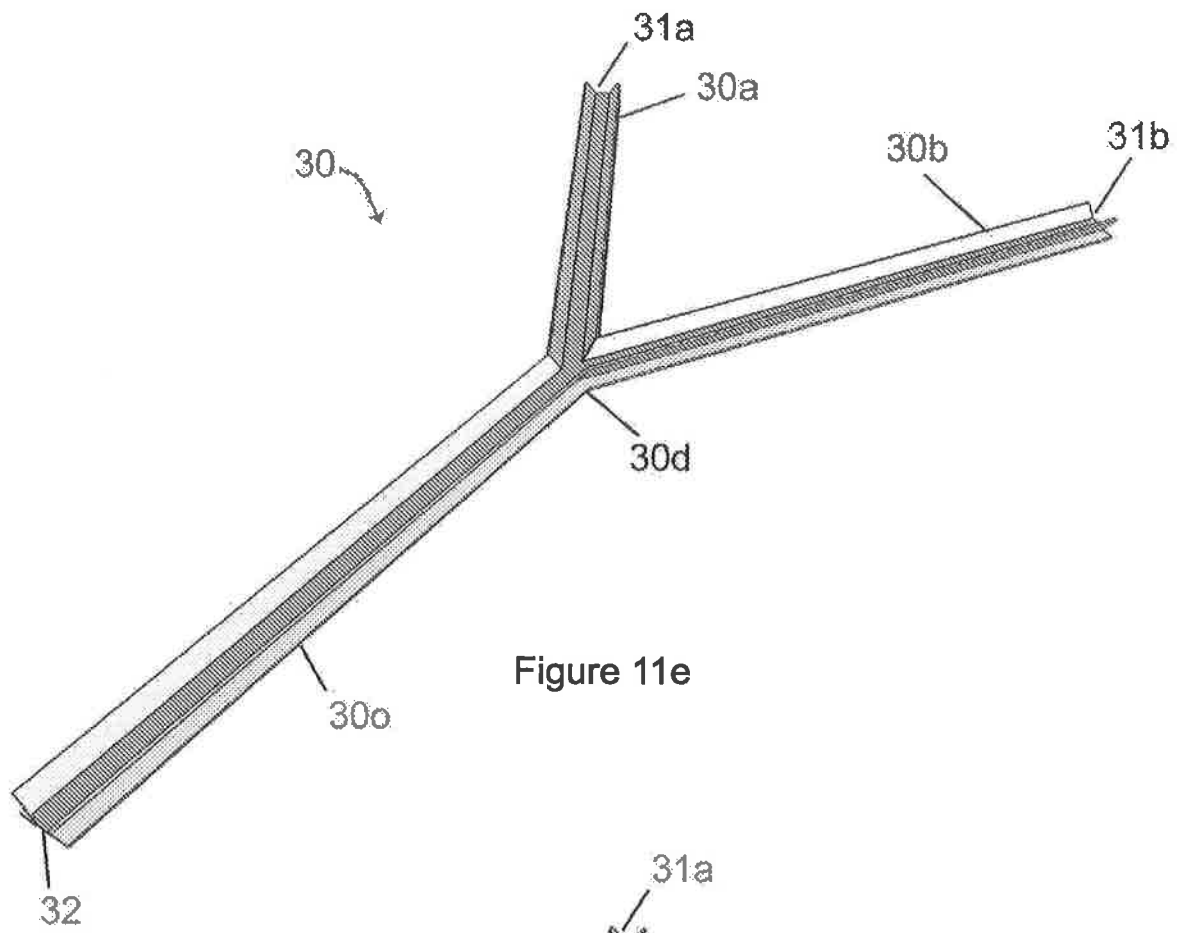


Figure 11e

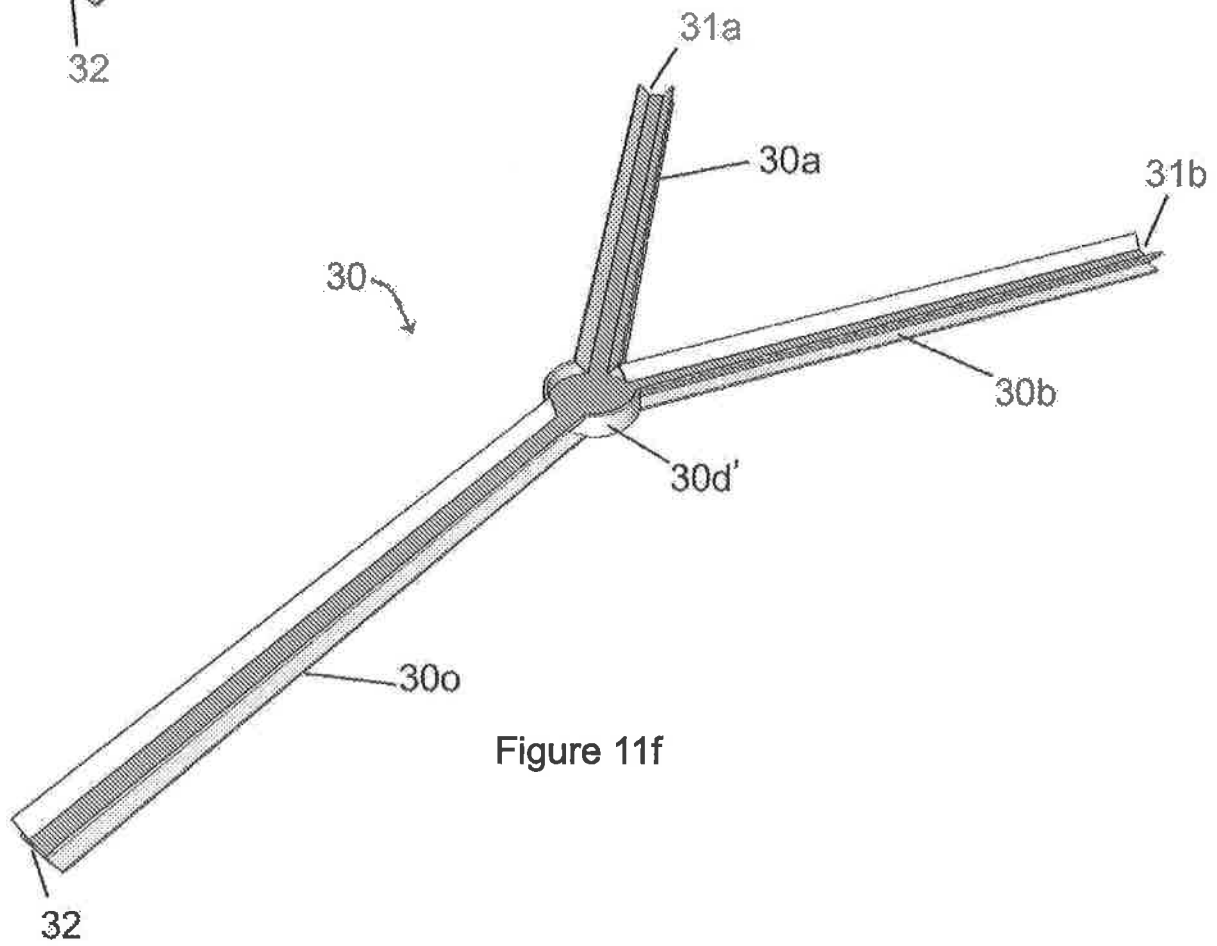


Figure 11f

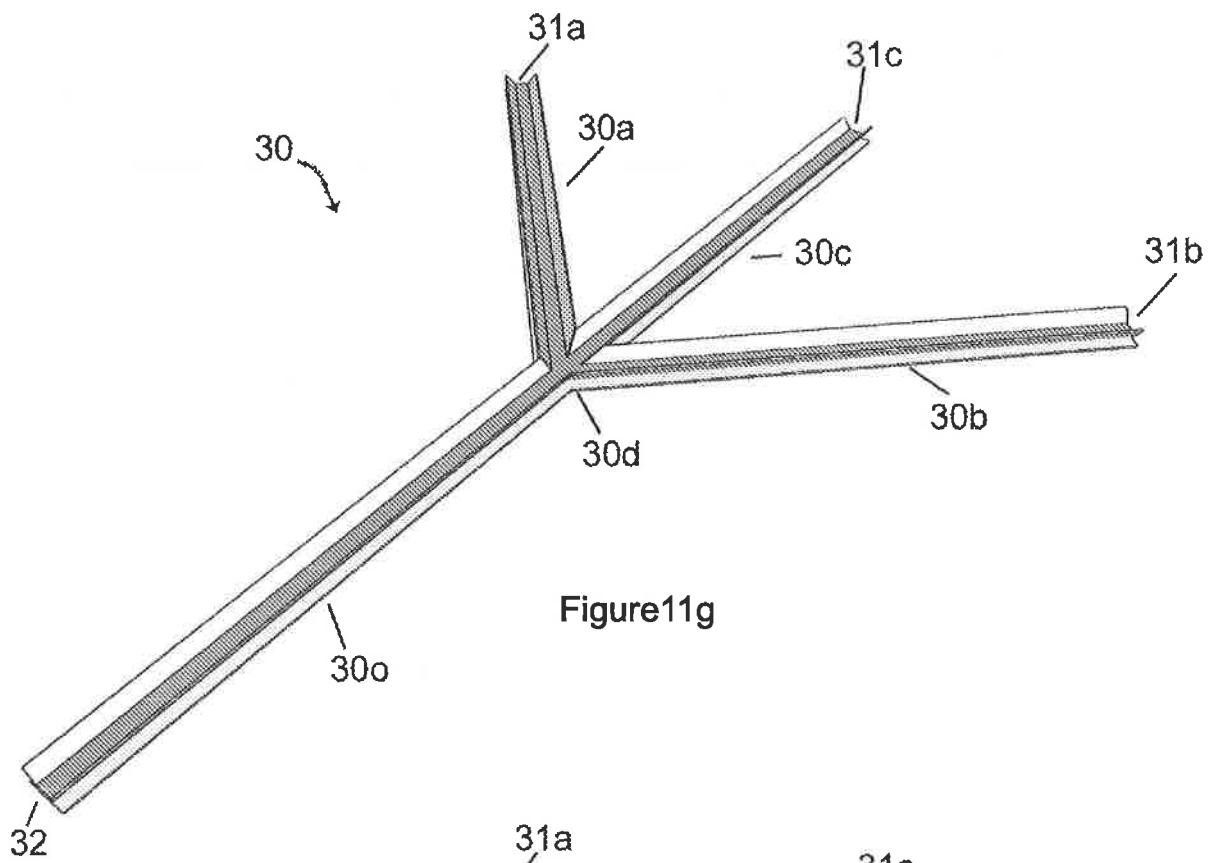


Figure 11g

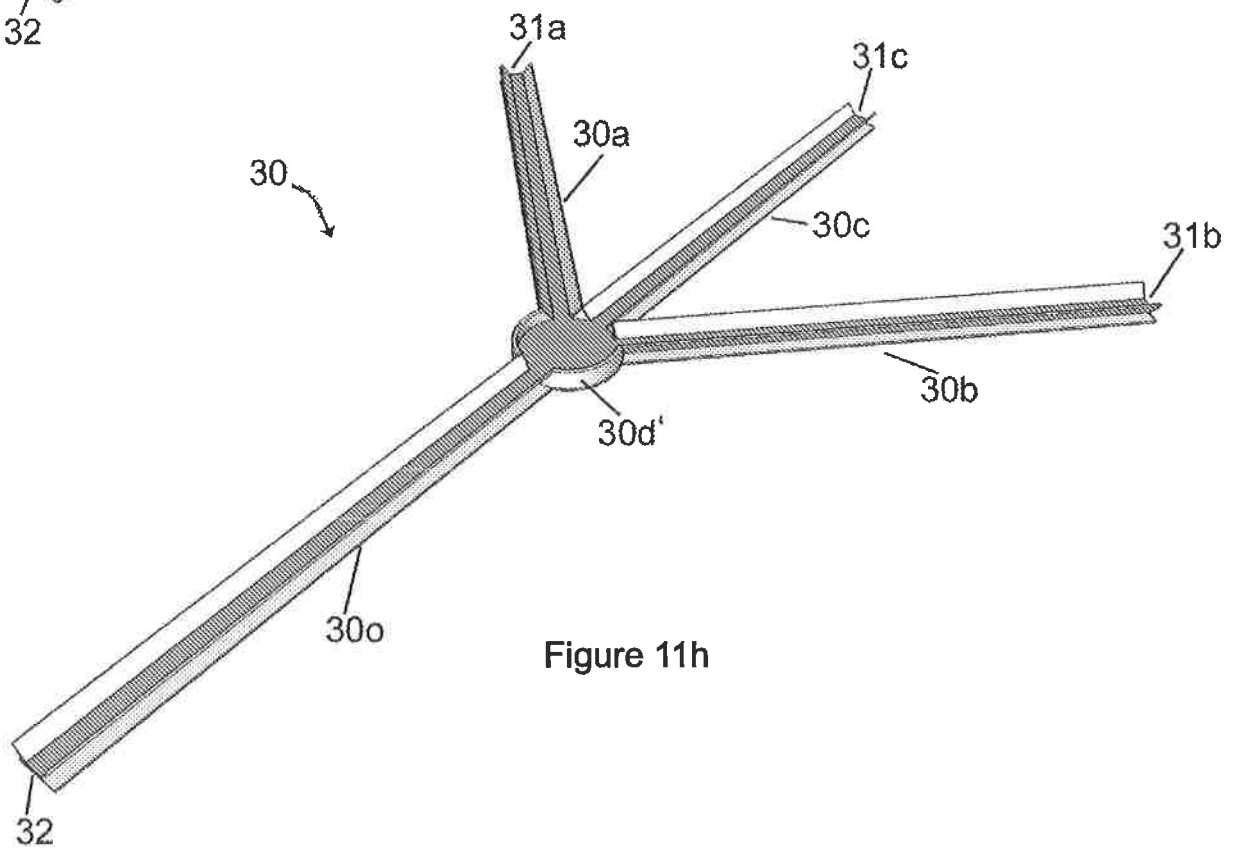


Figure 11h

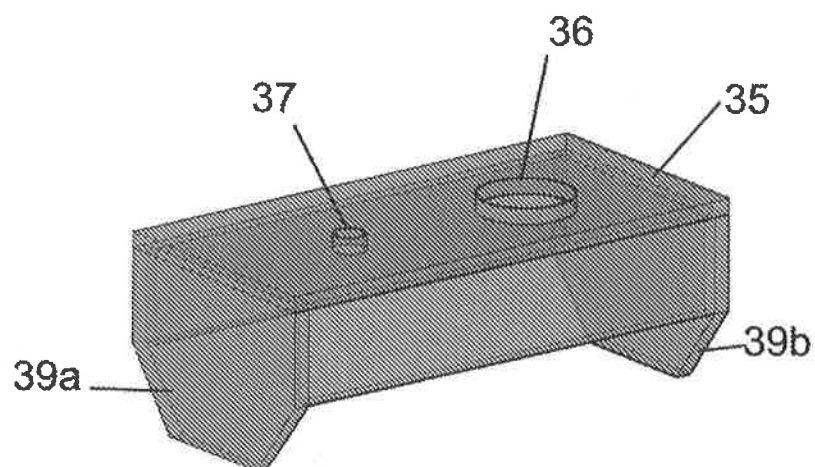


Figure 12a

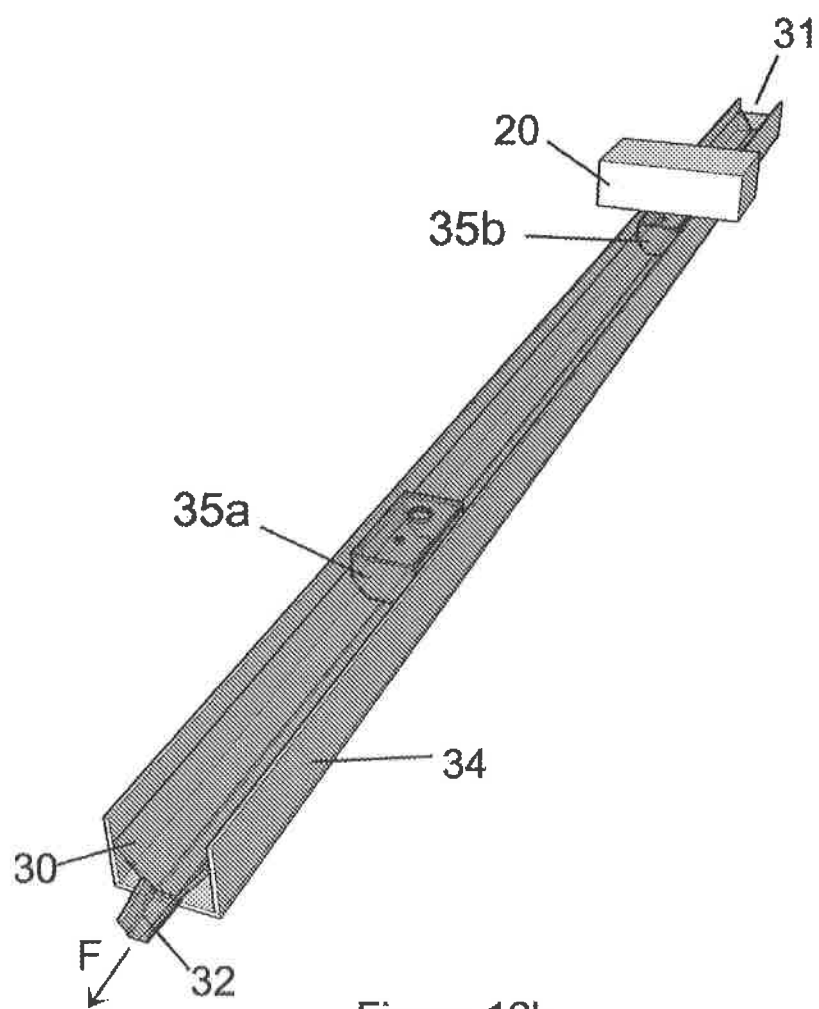


Figure 12b

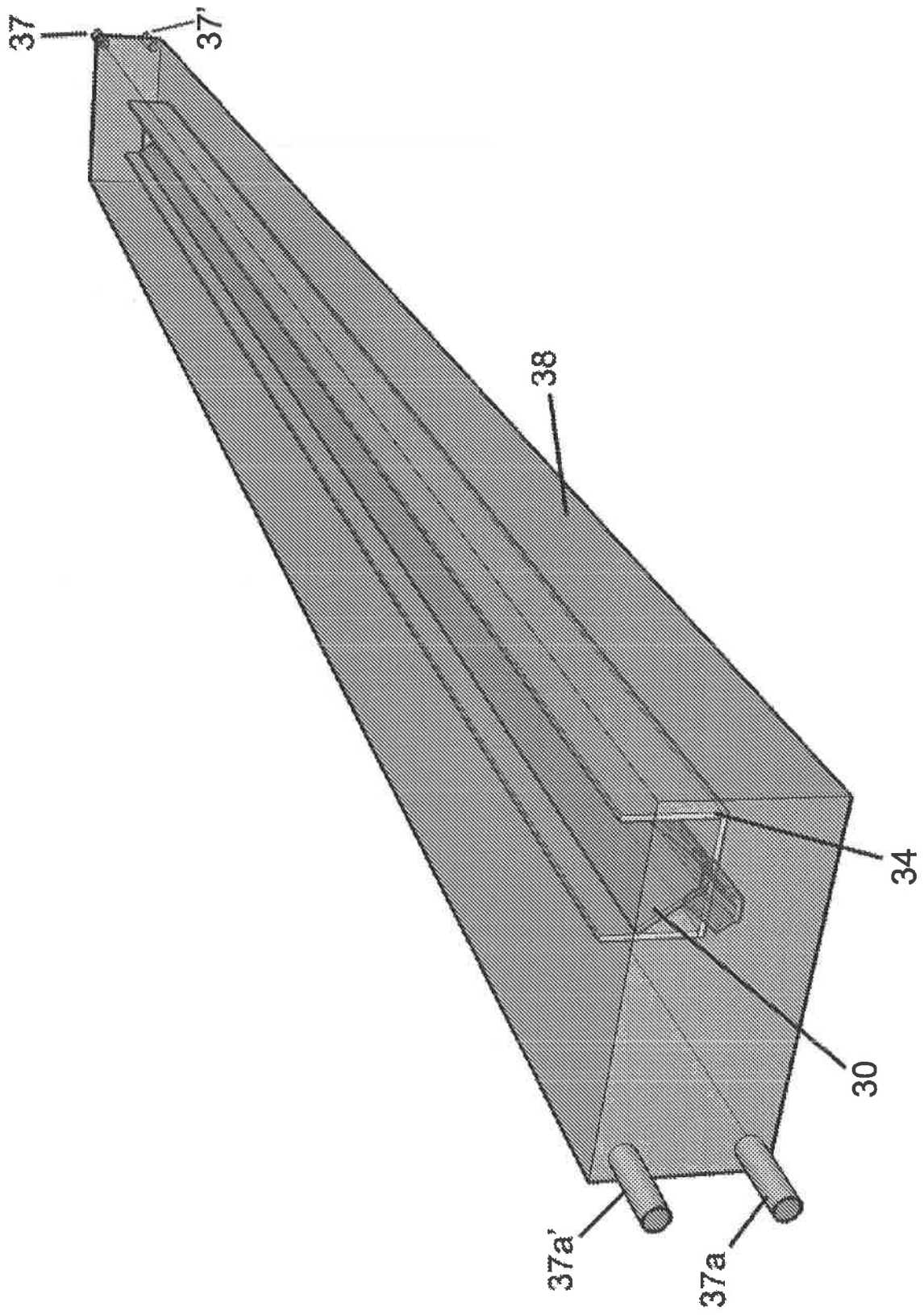


Figure 13

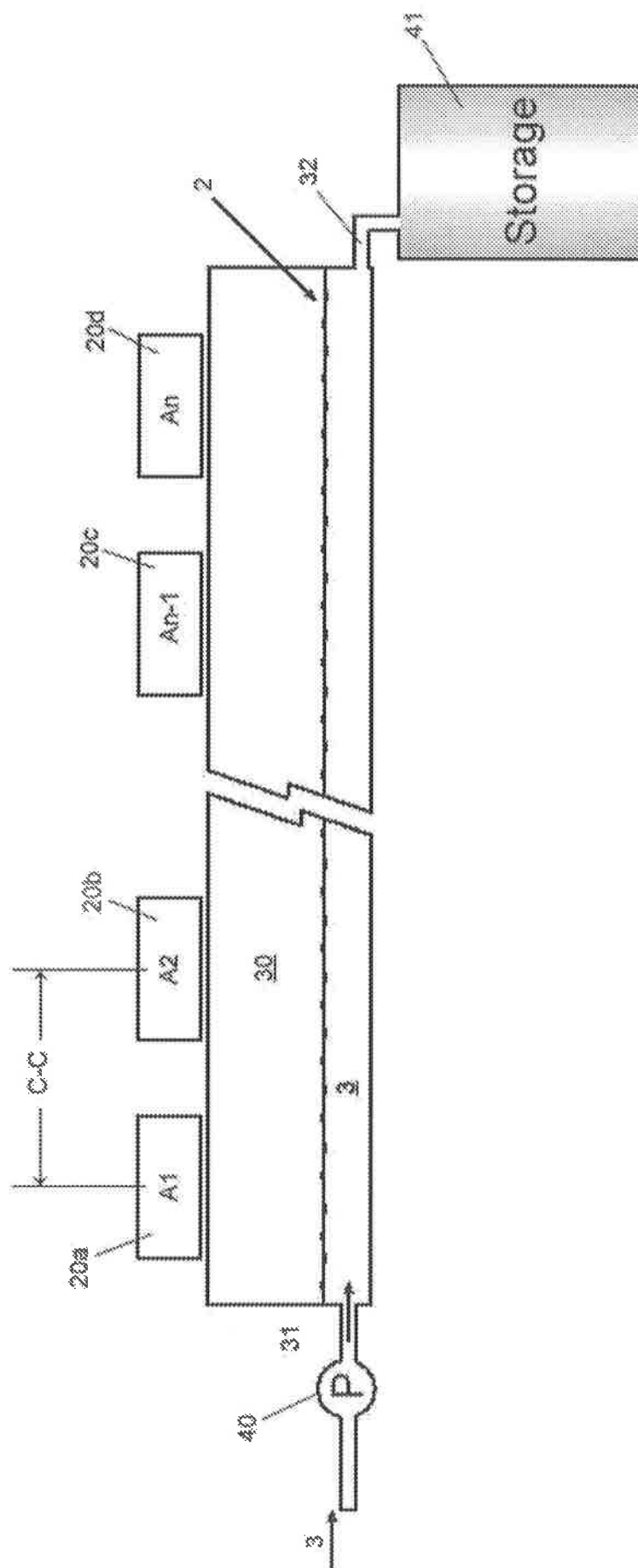


Figure 14

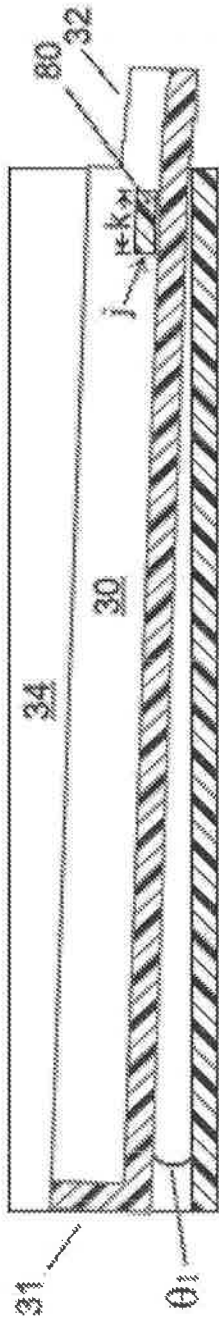


Figure 15a

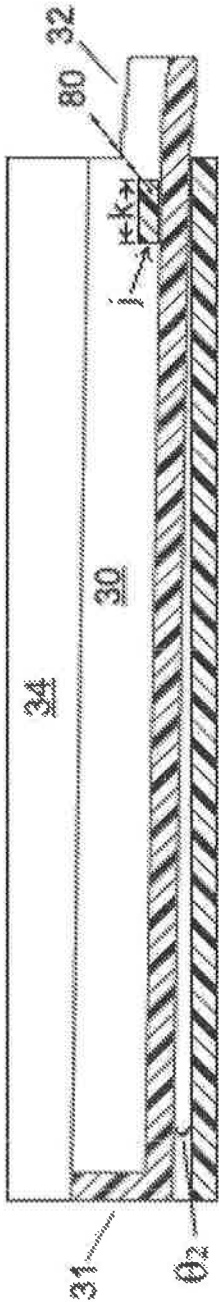


Figure 15b

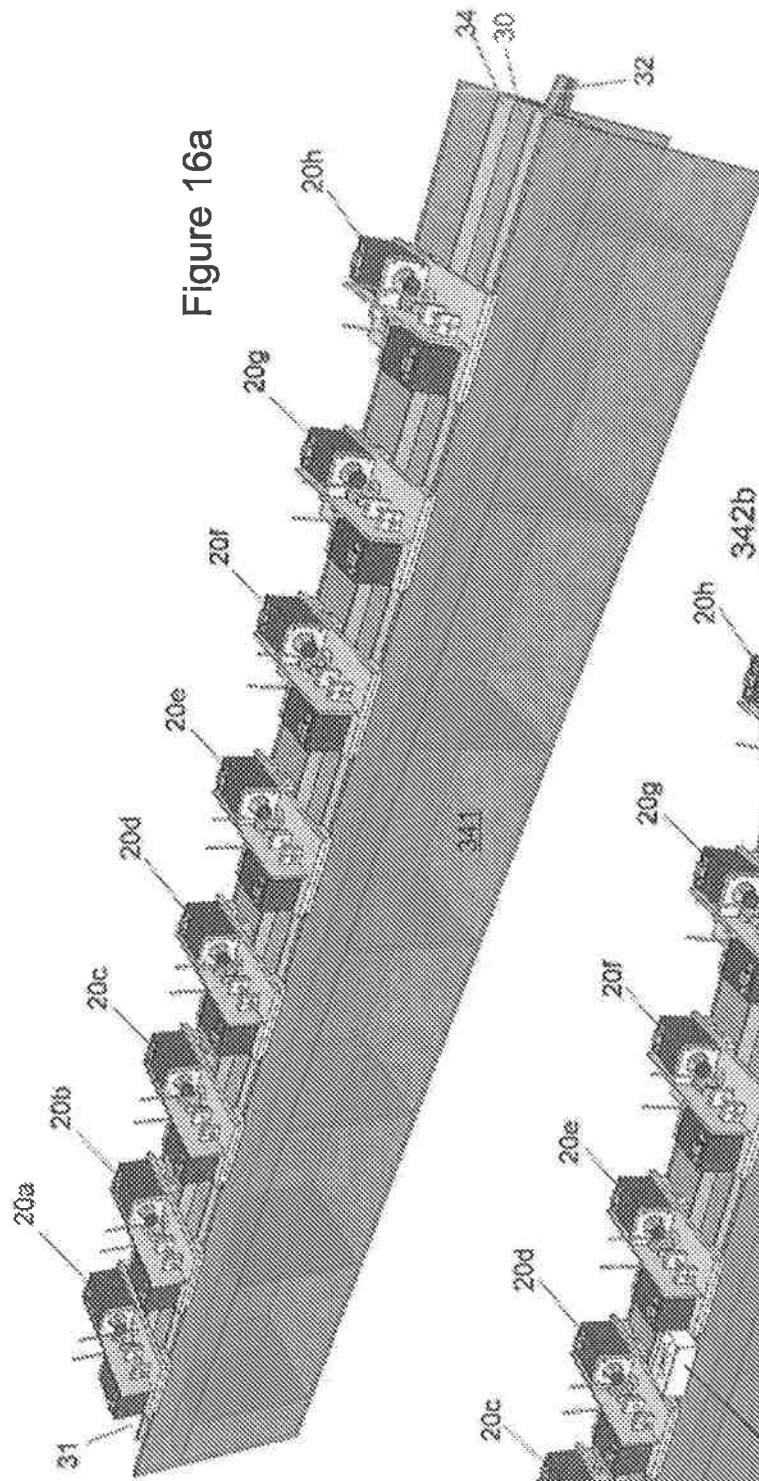


Figure 16a

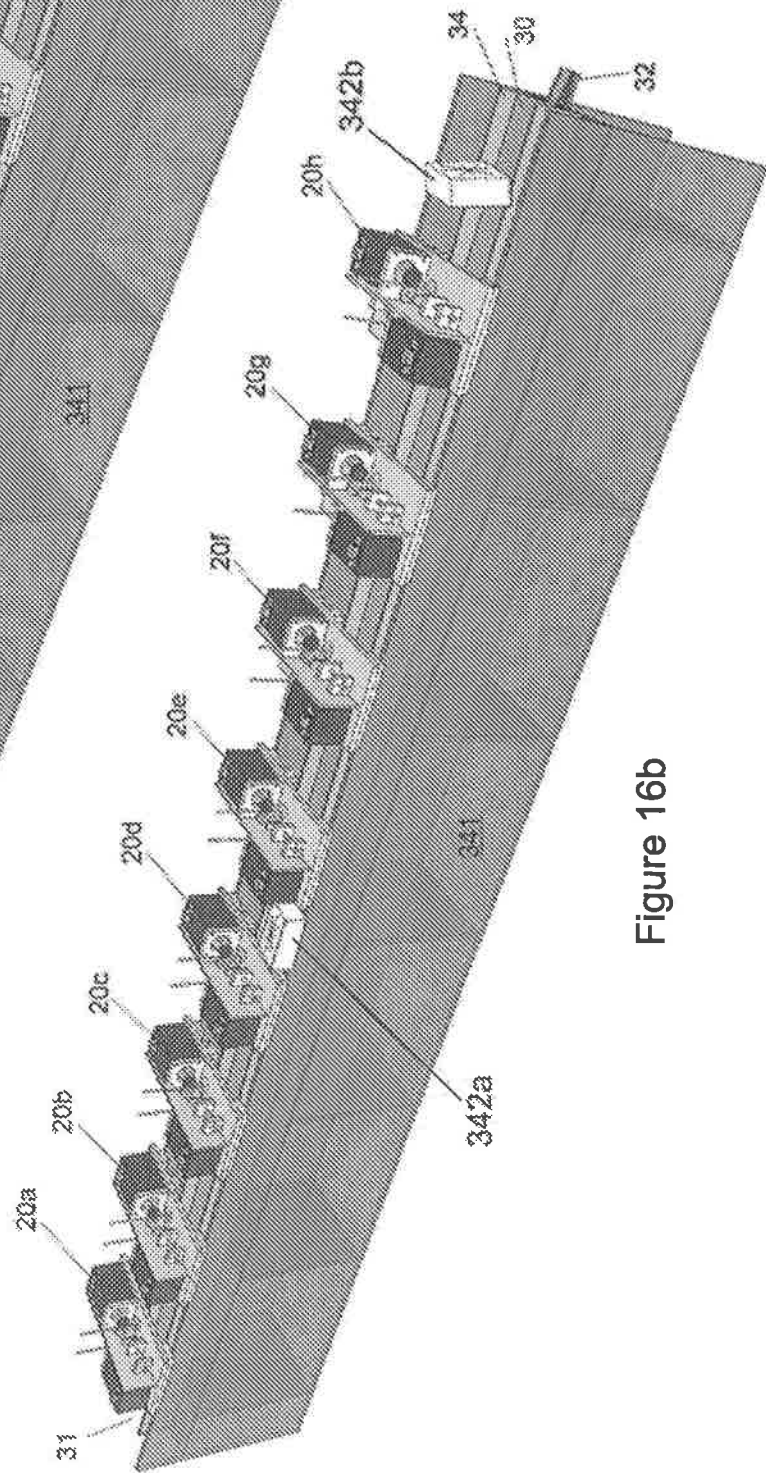


Figure 16b

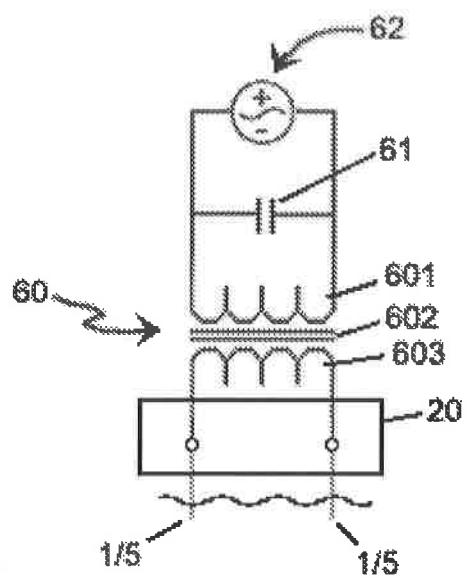


Figure 16d

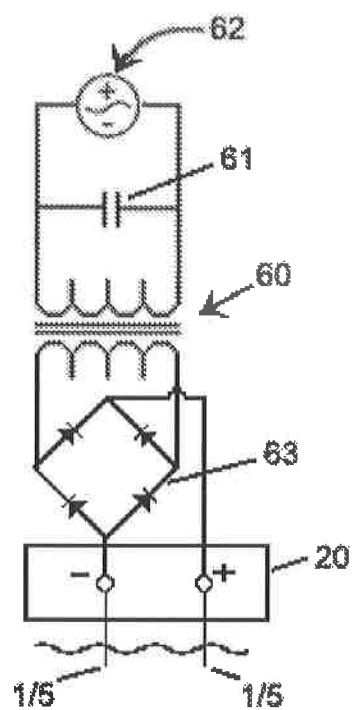


Figure 16e

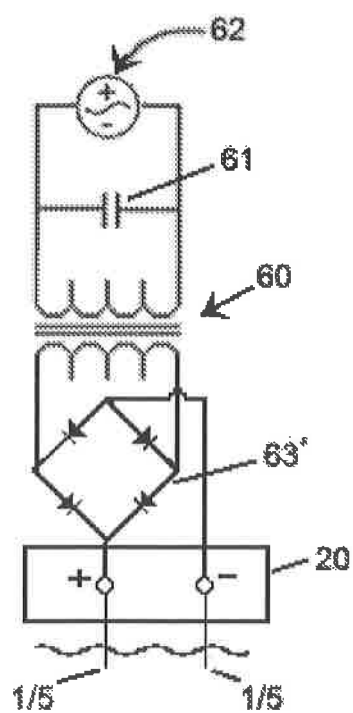


Figure 16f

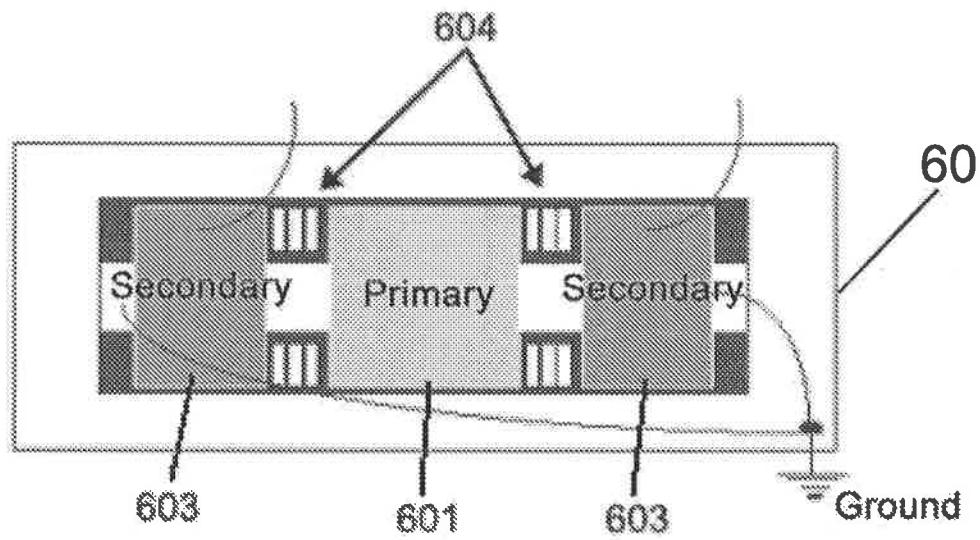


Figure 16g

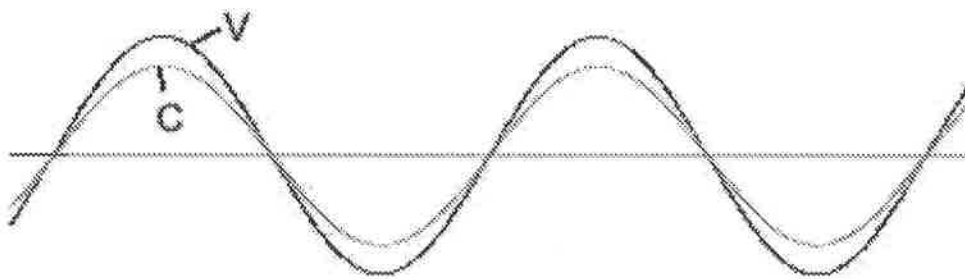


Figure 16h

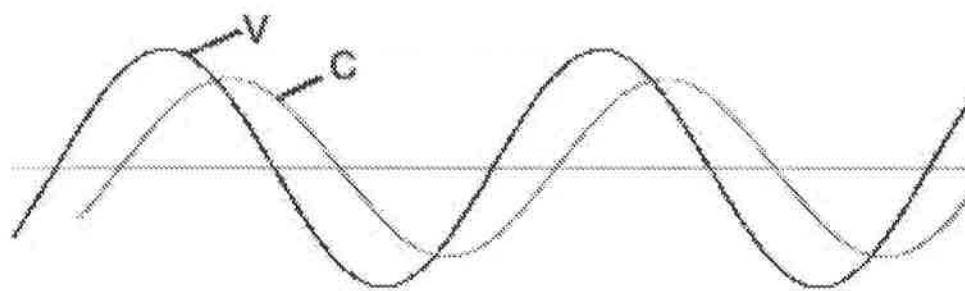


Figure 16i

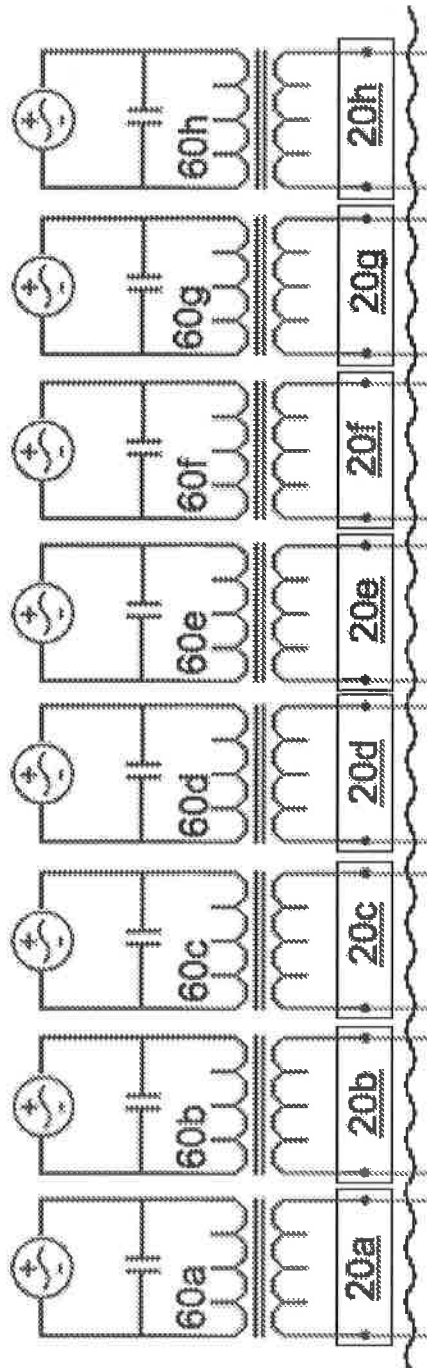


Figure 16j

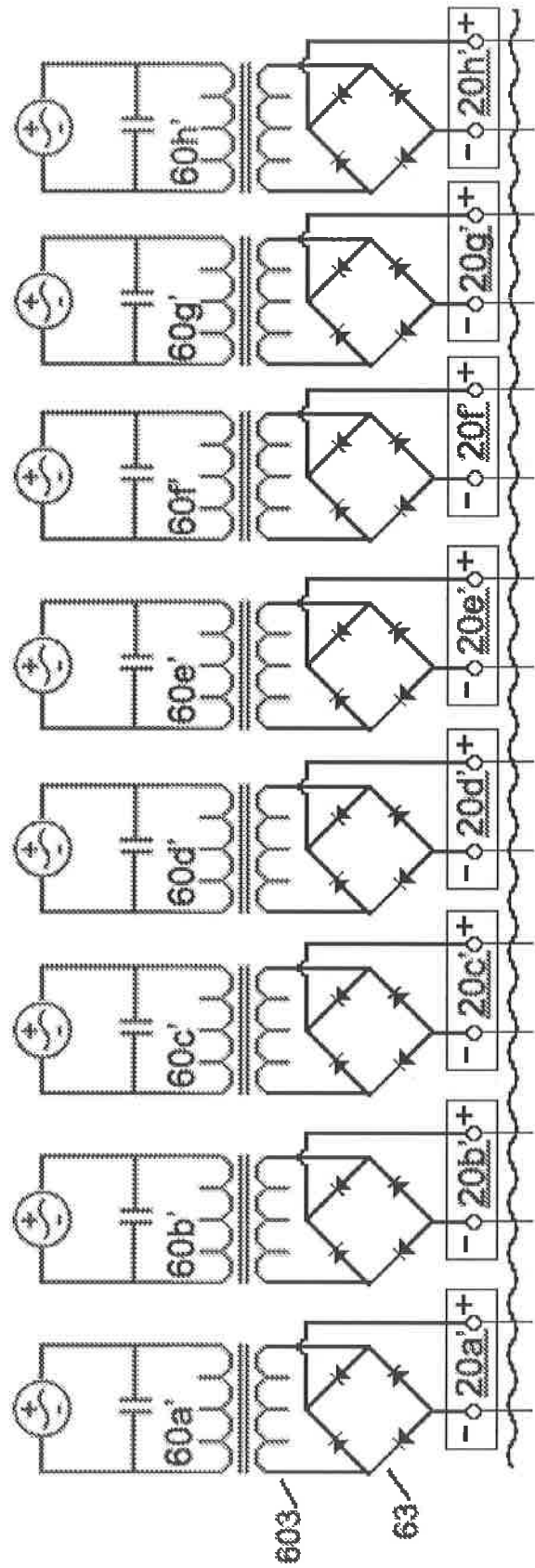


Figure 16k

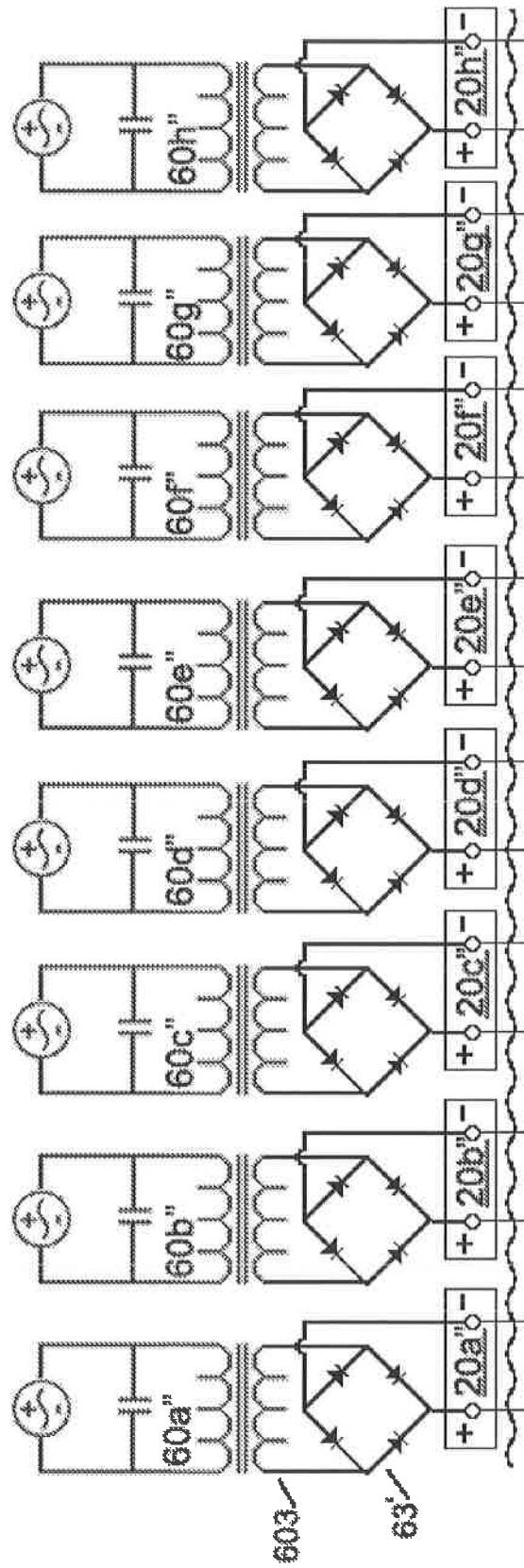


Figure 16l

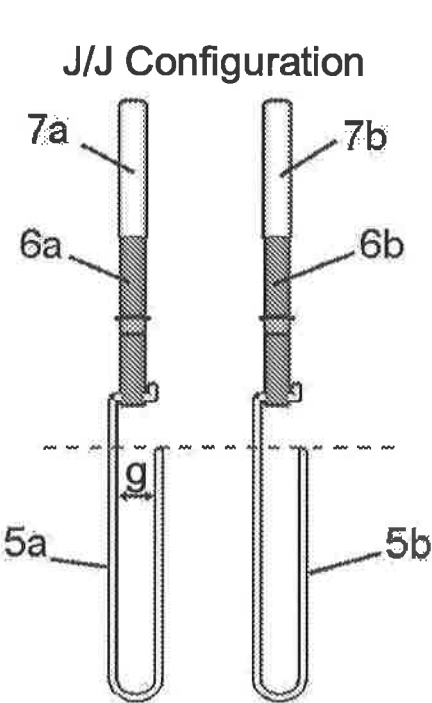


Figure 17a

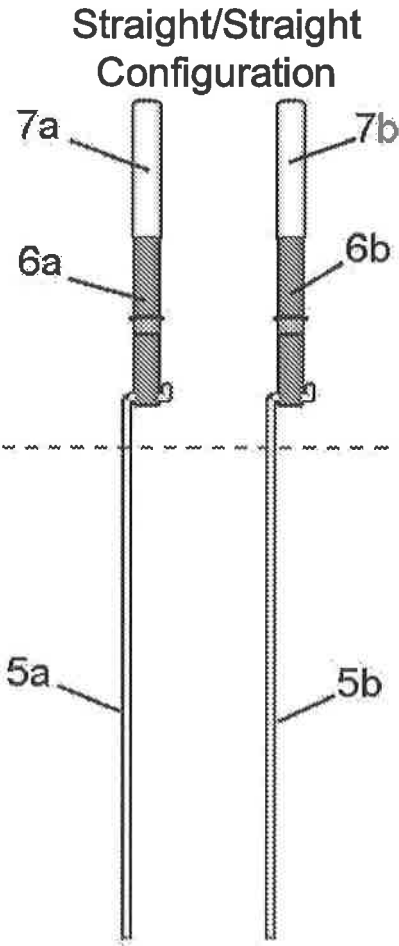


Figure 17b

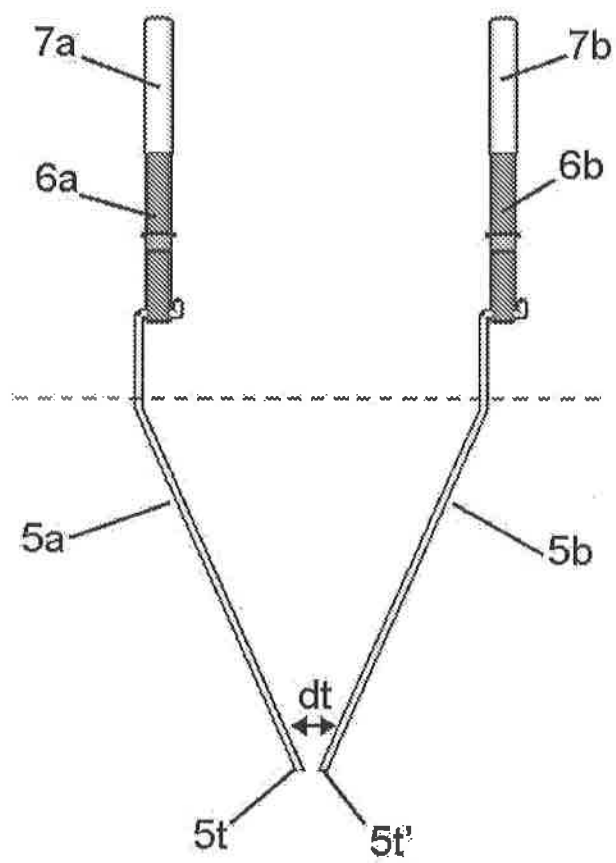


Figure 17c

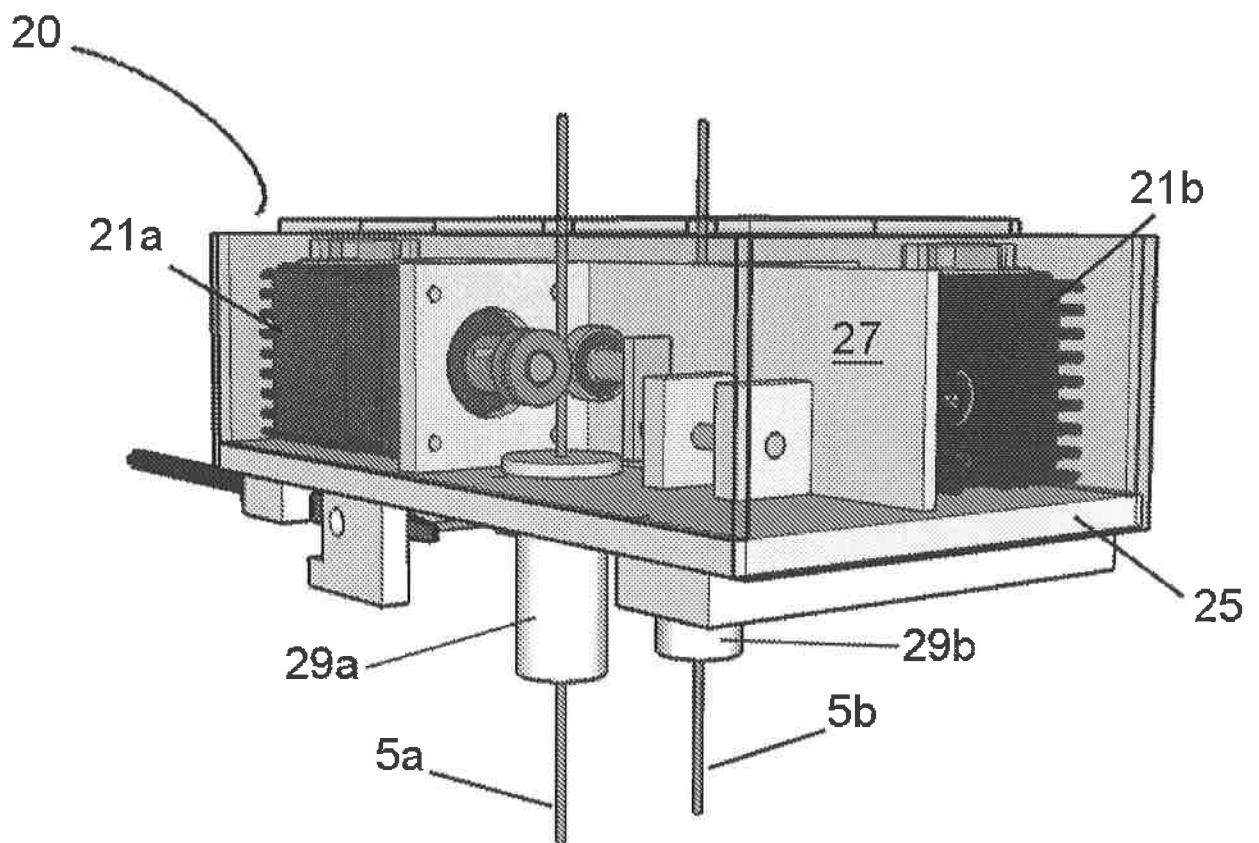


Figure 17d

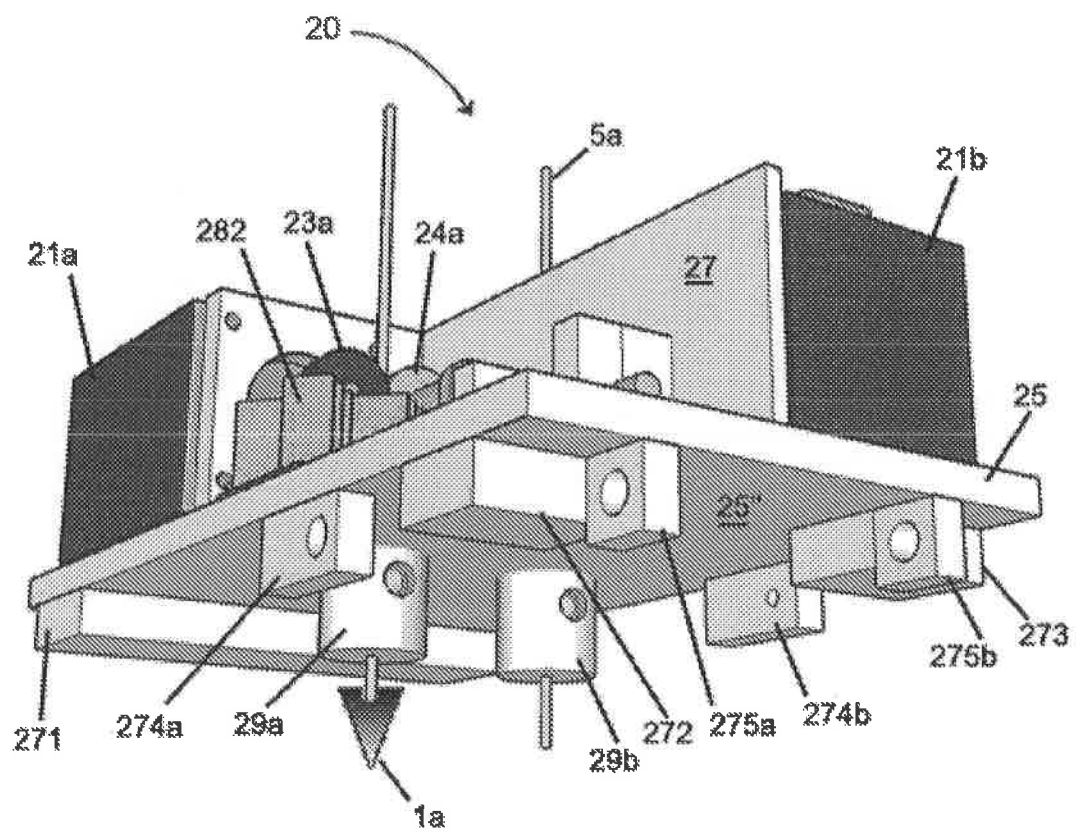


Figure 17e

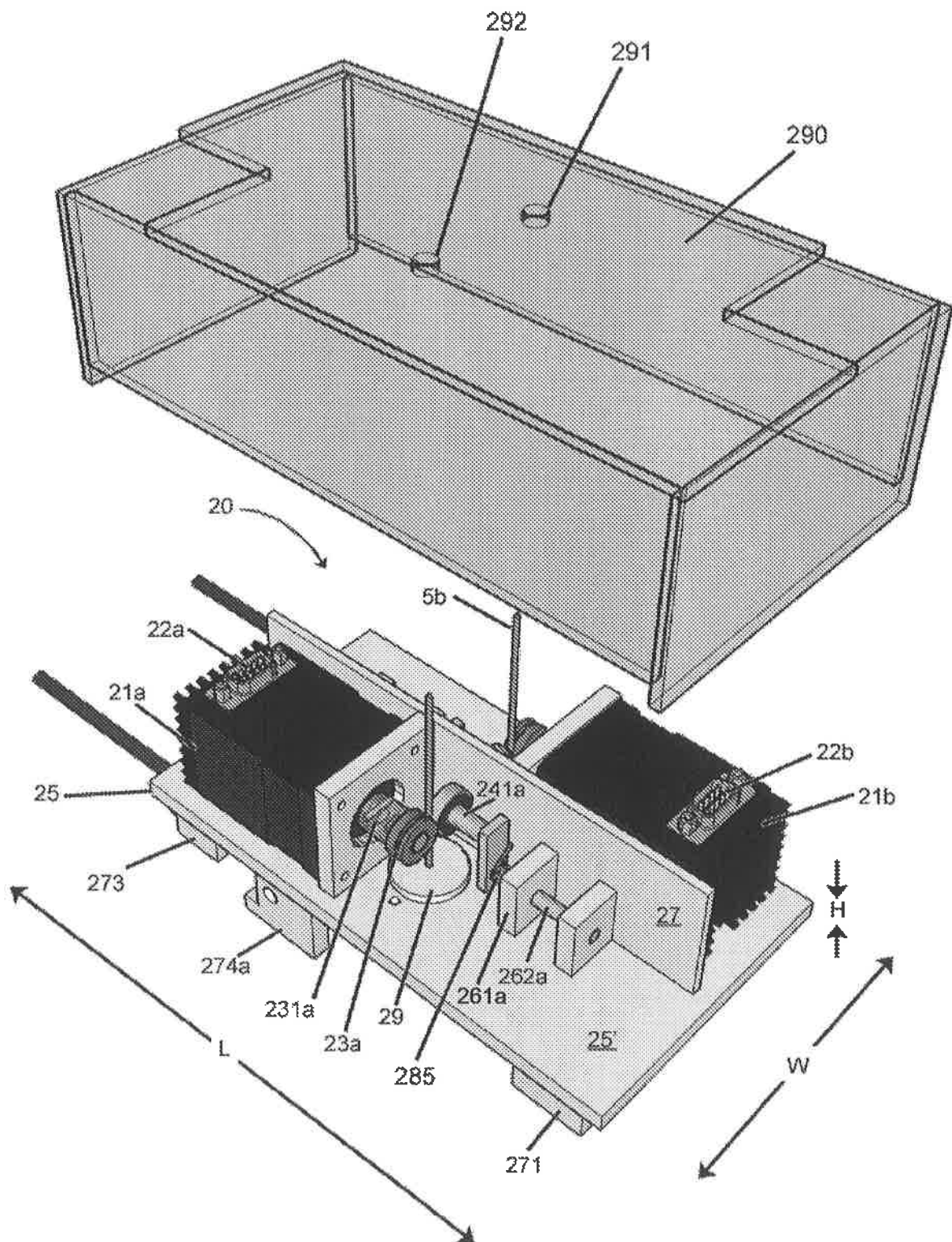


Figure 17f

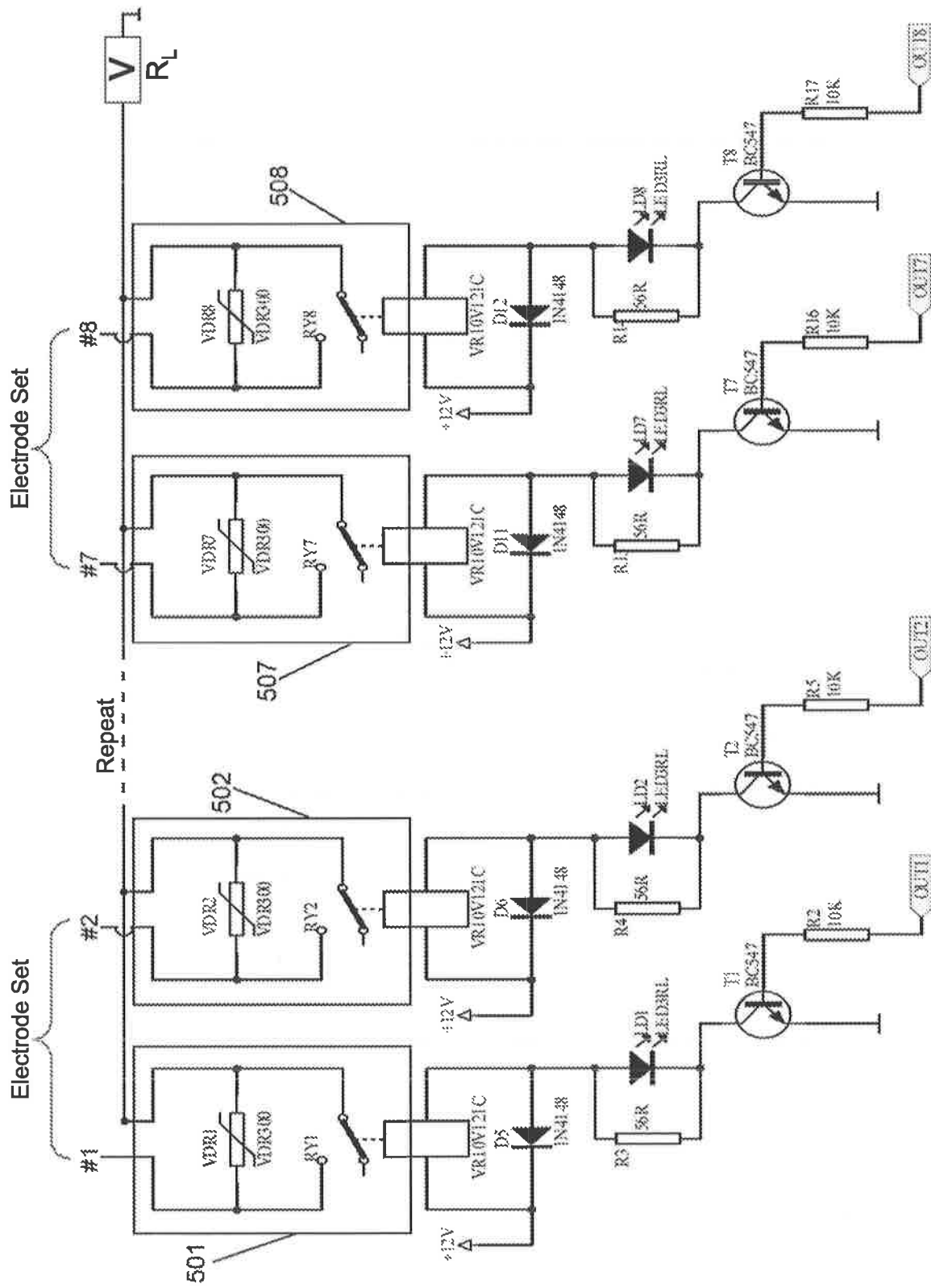


Figure 17g

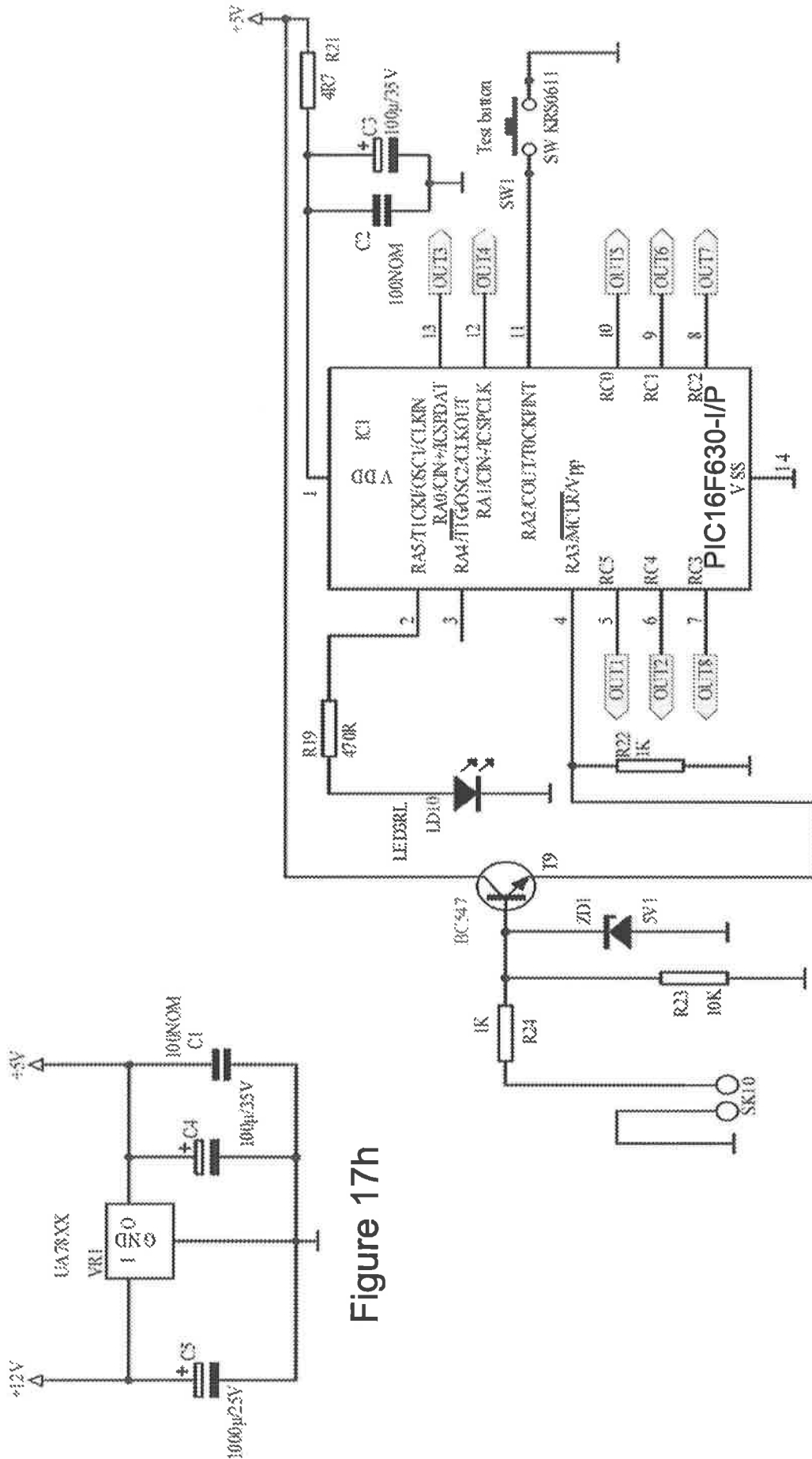
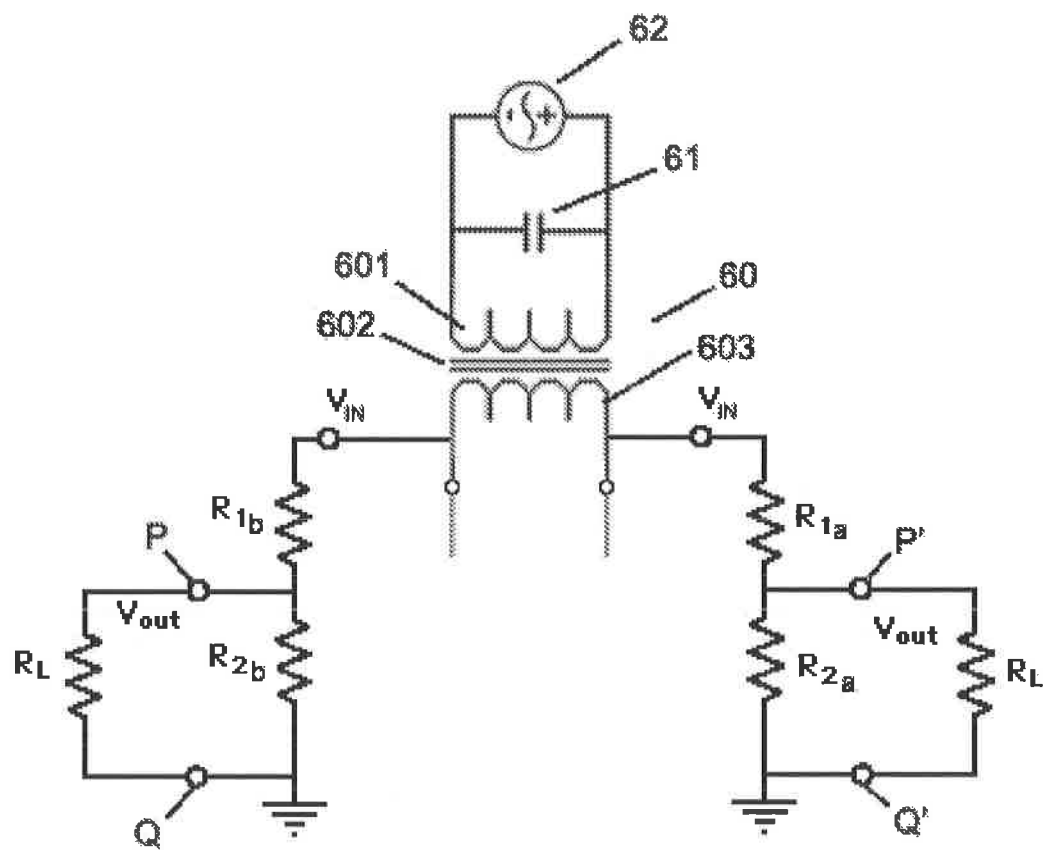


Figure 17i

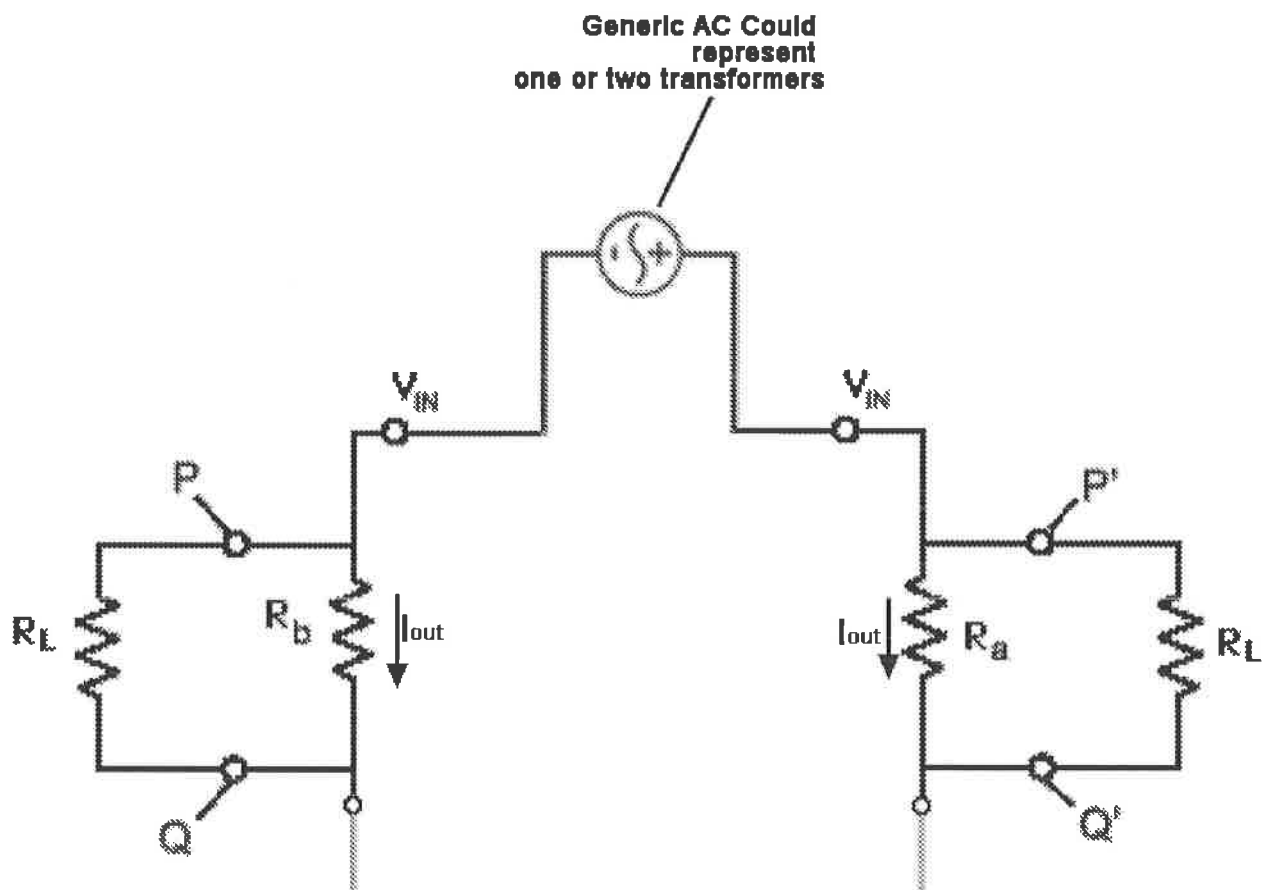
Figure 17h



$$V_{out} = \frac{V_1(R_2 \parallel R_L)}{(R_1 + R_2 \parallel R_L)}$$

$R_L = 10\text{M Ohm}$ input impedance of Multimeter

Figure 17j



$$I_{out} = \frac{V_{out}}{(R || R_L)}$$

$R_L = 10M$ Ohm input impedance of Multimeter

Figure 17I

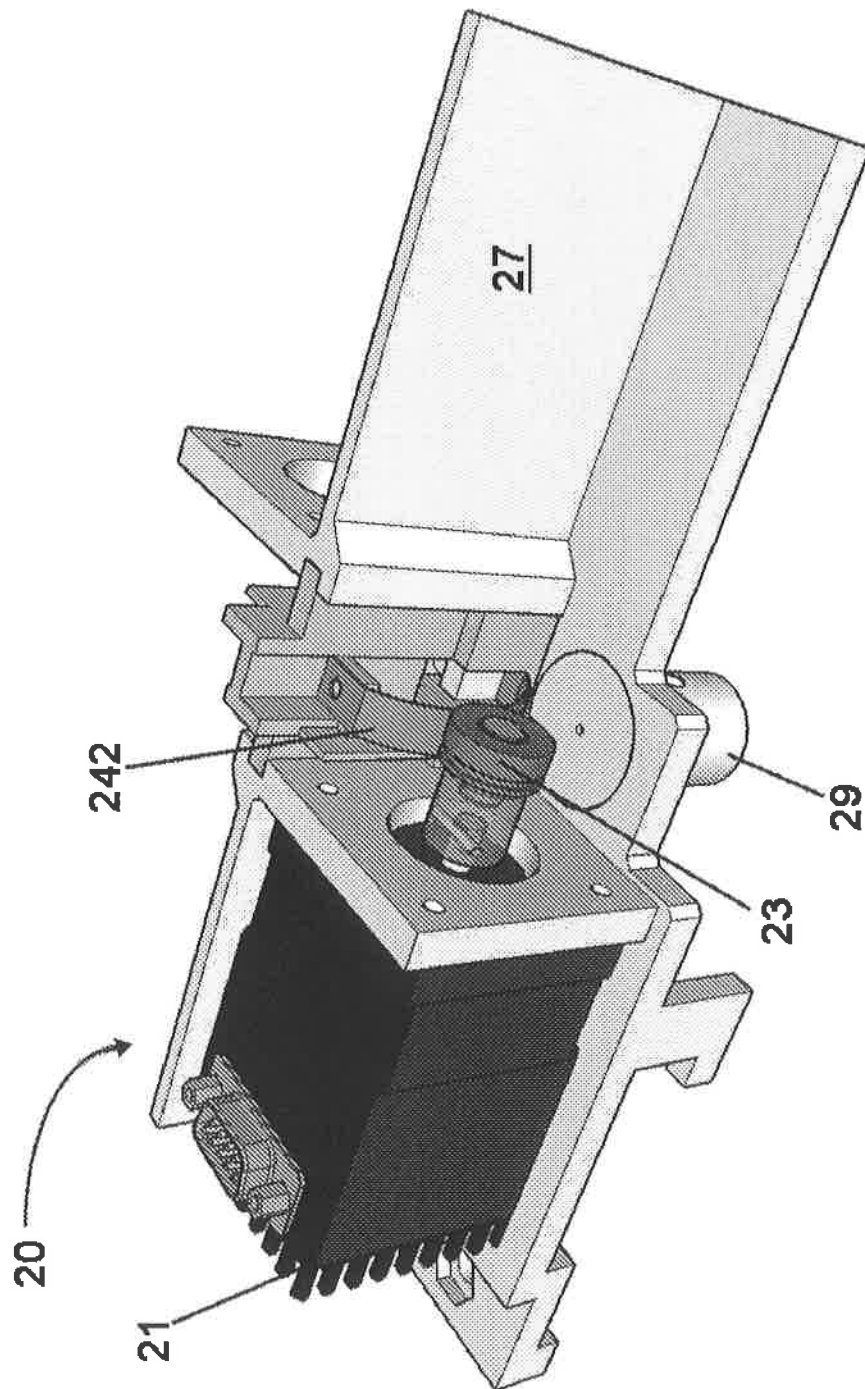


Figure 17m

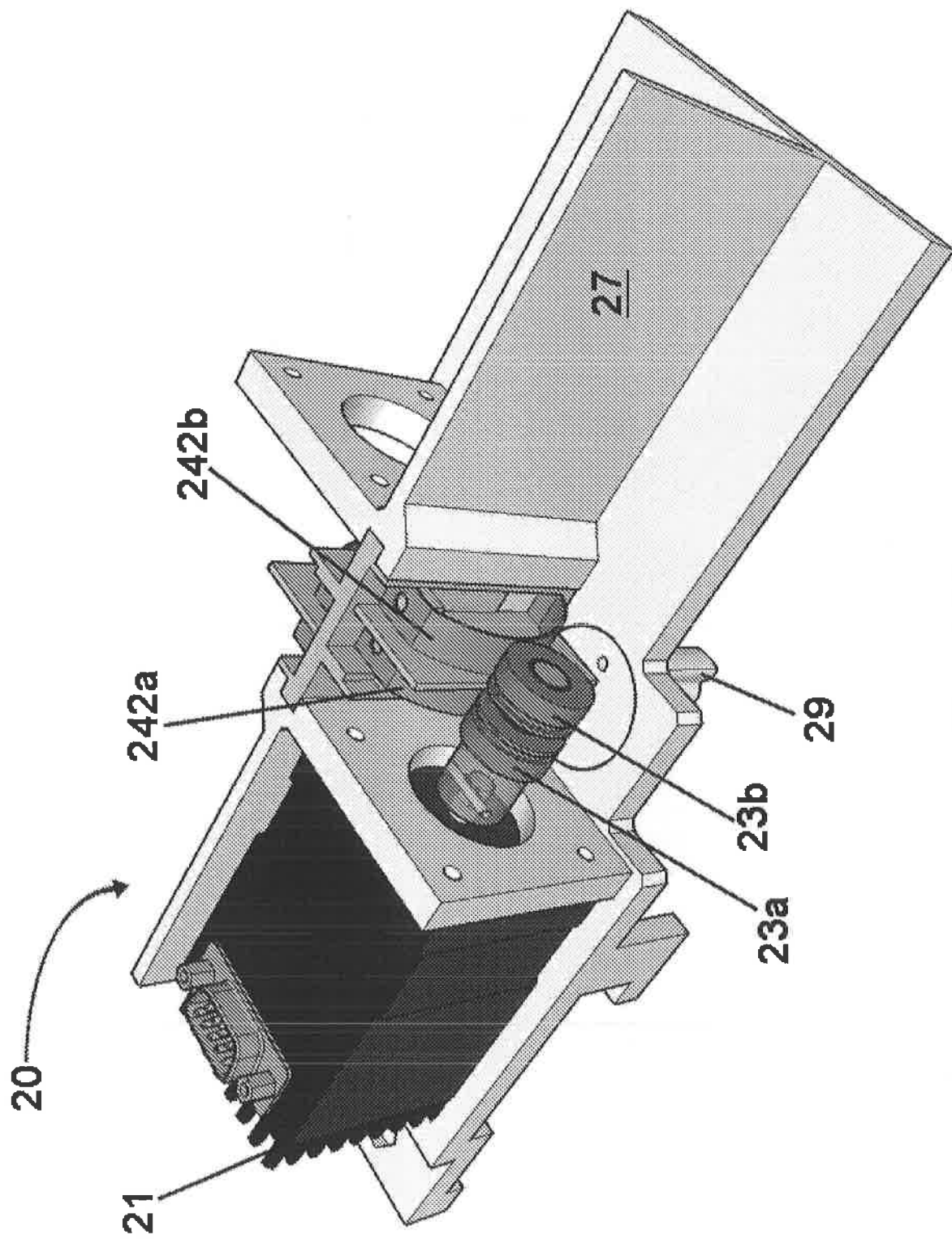


Figure 17n

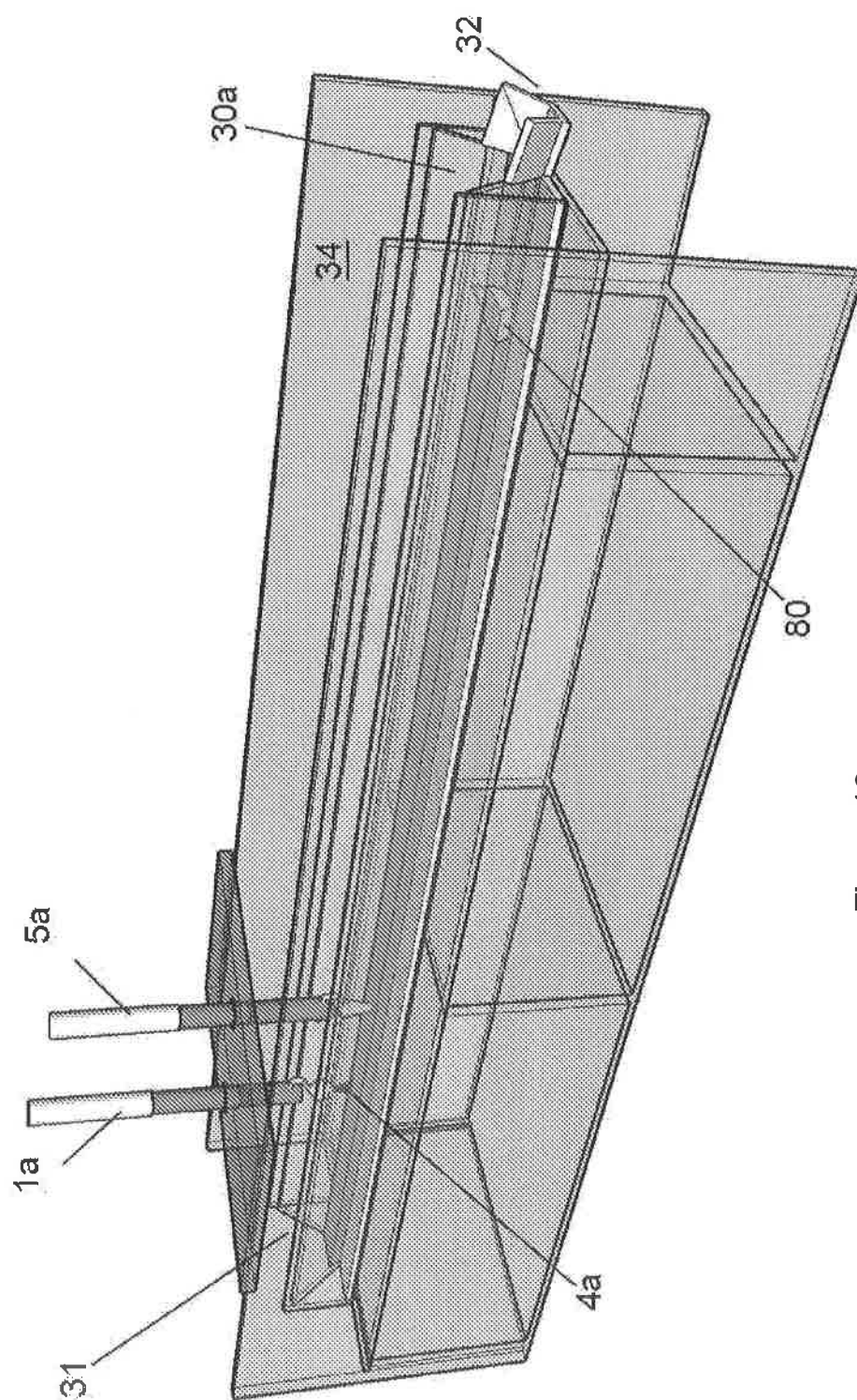


Figure 18a

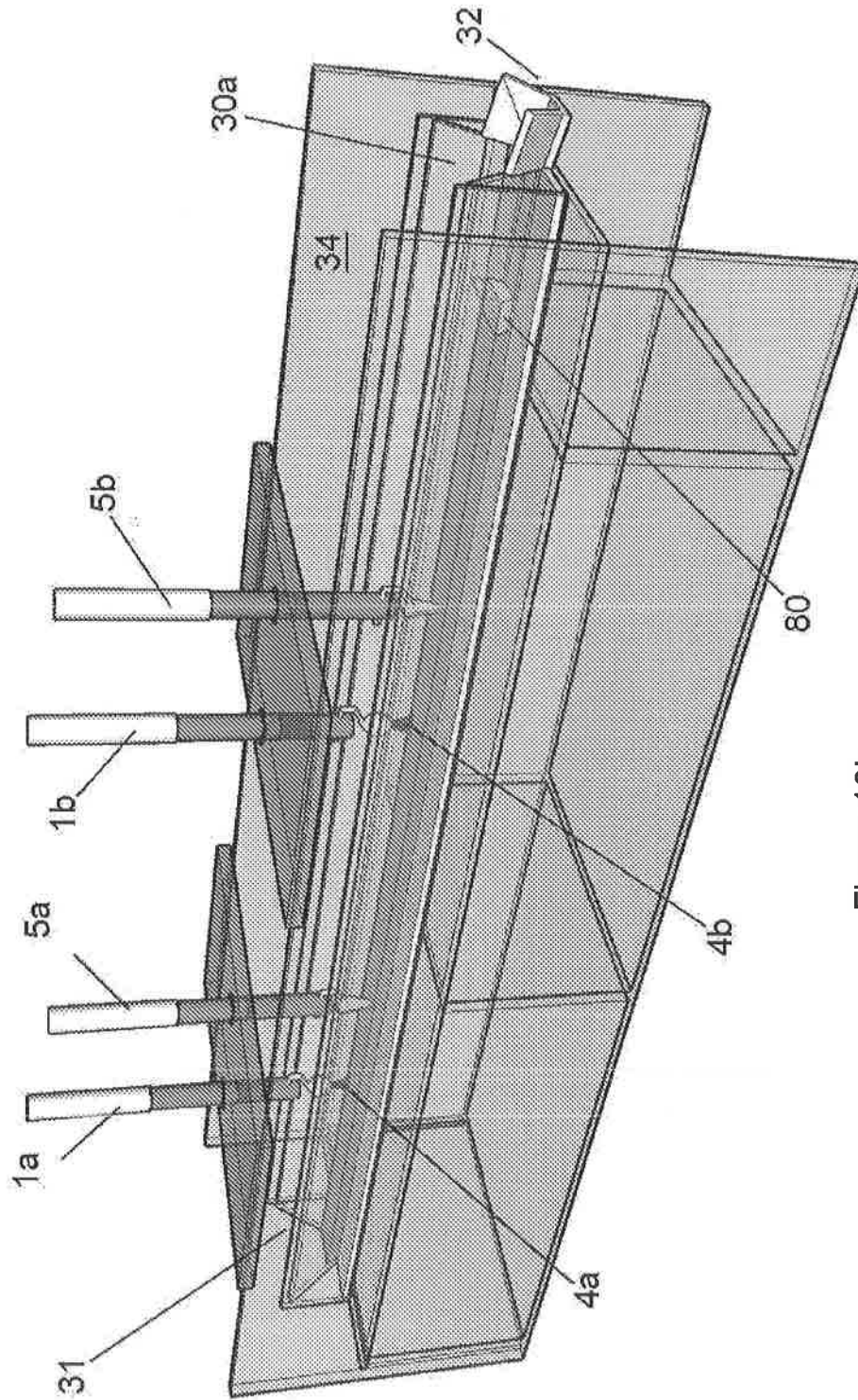


Figure 18b

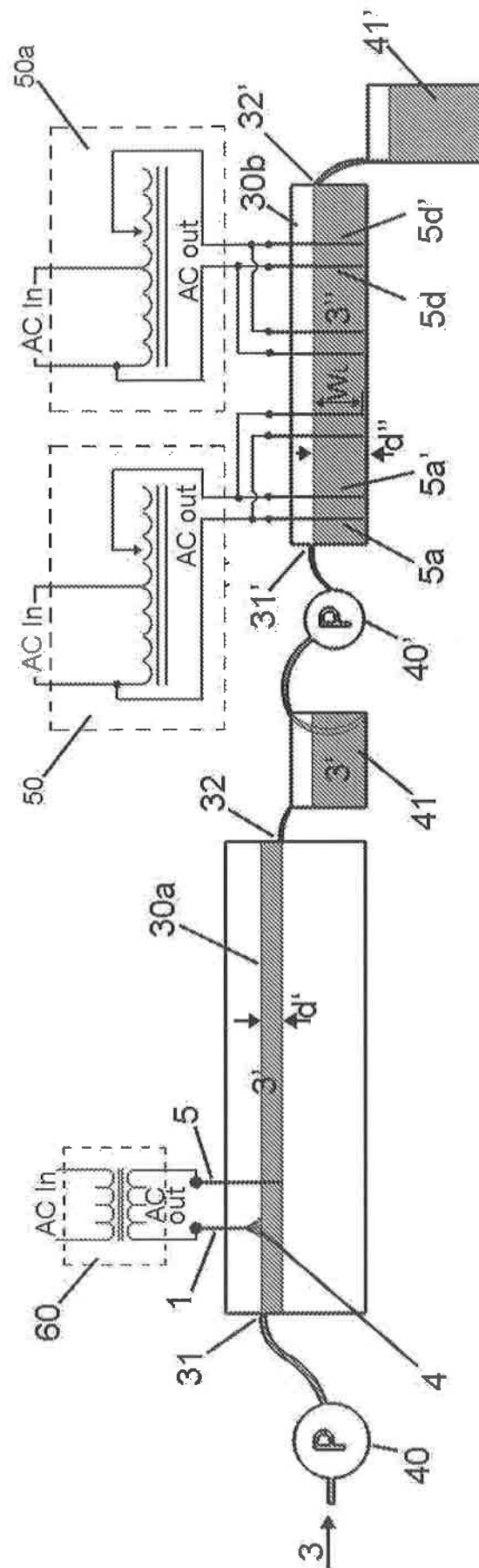


Figure 19a

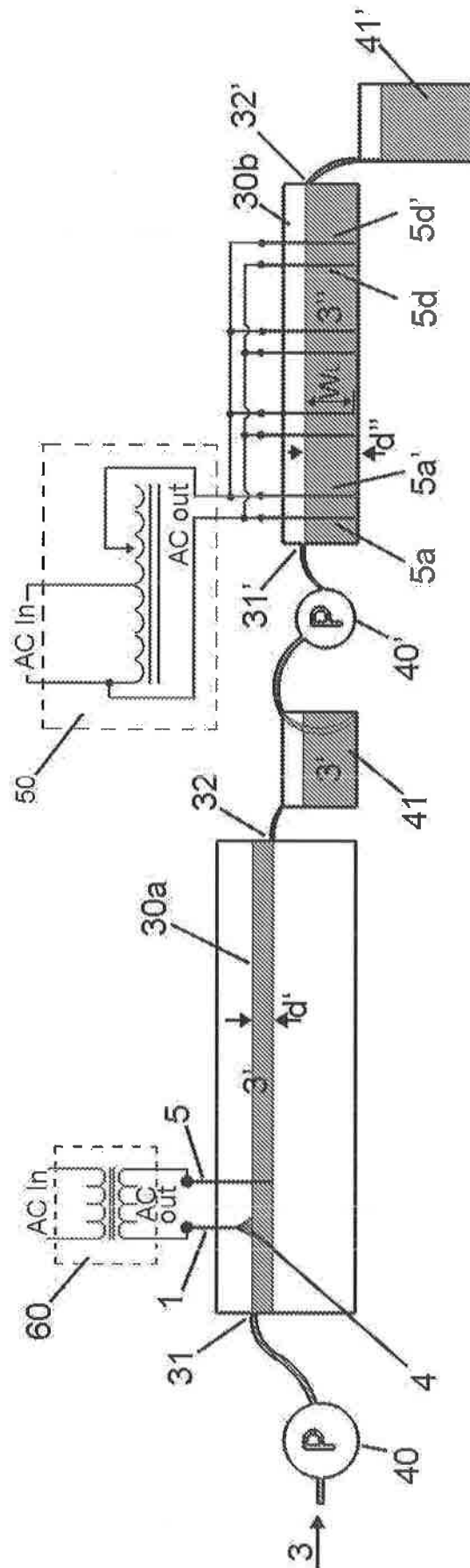


Figure 19b

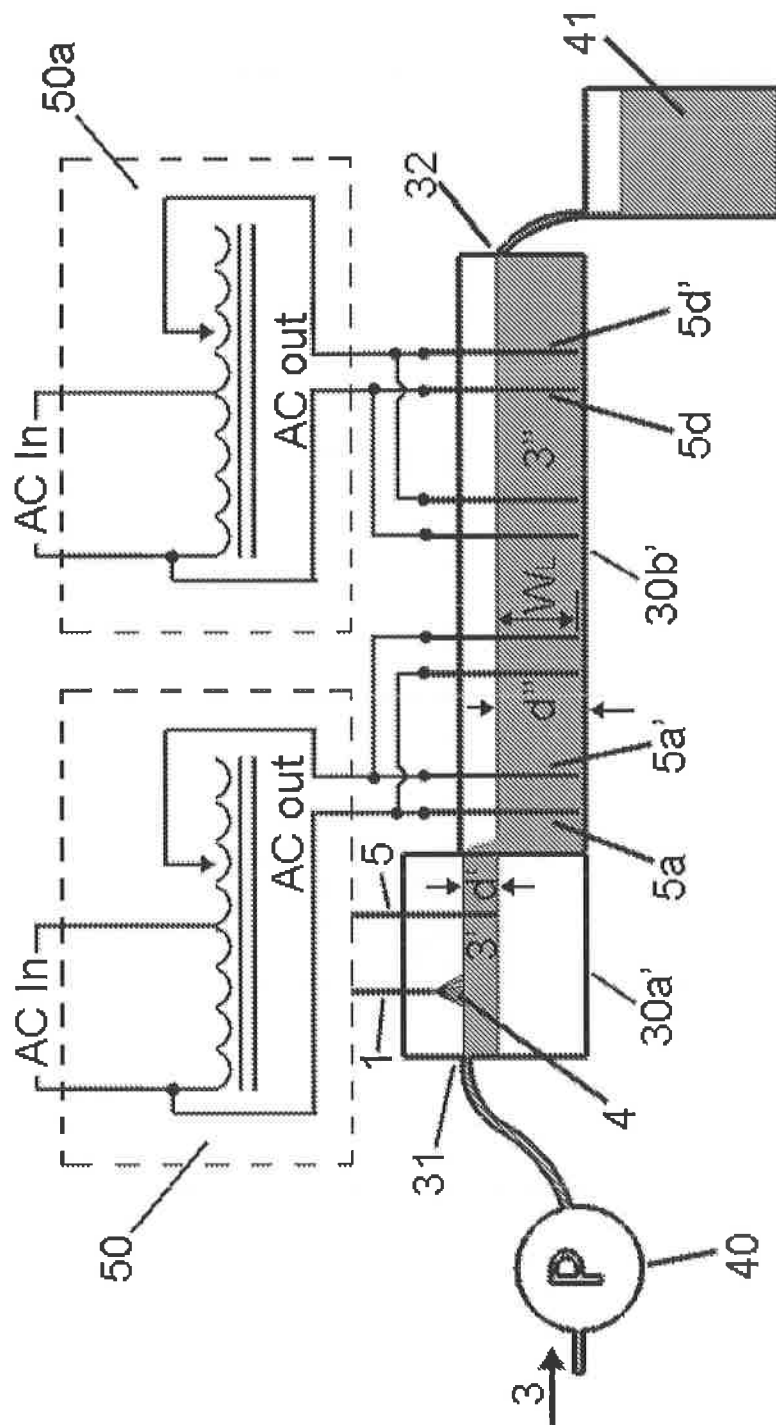


Figure 20b

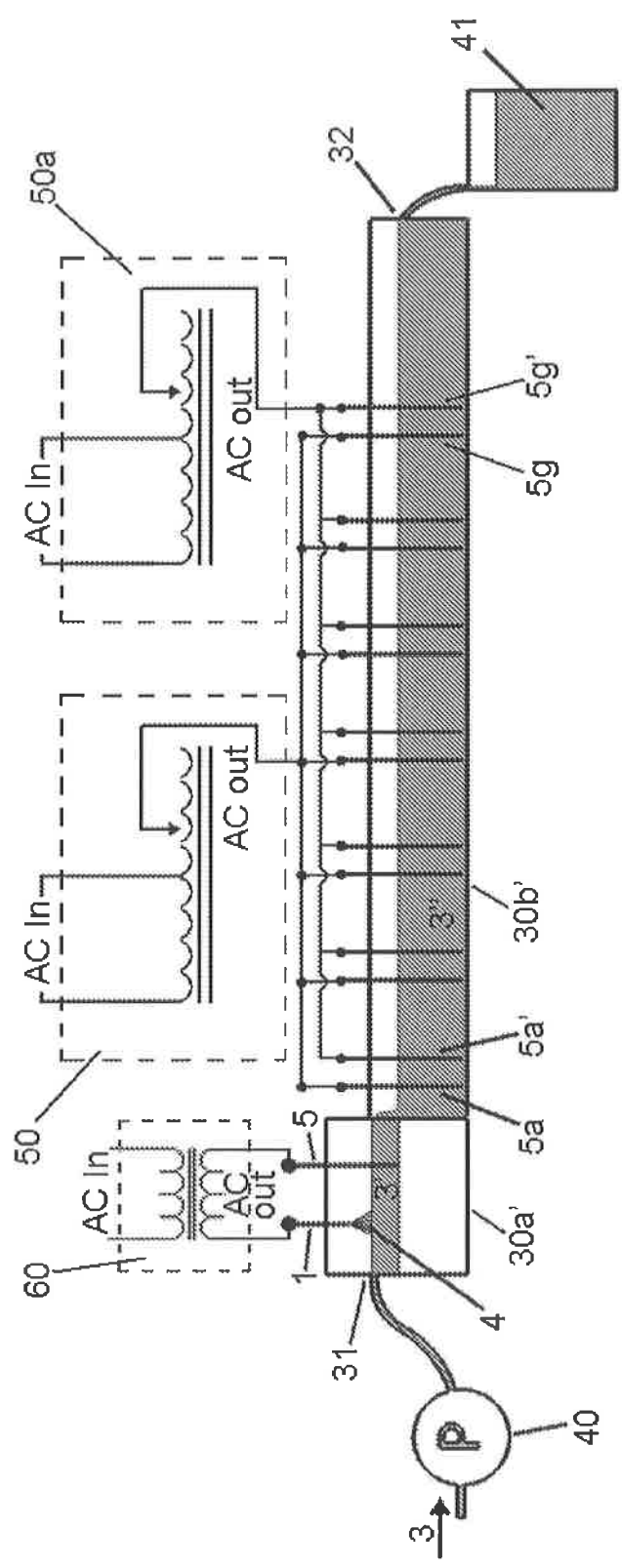


Figure 20c

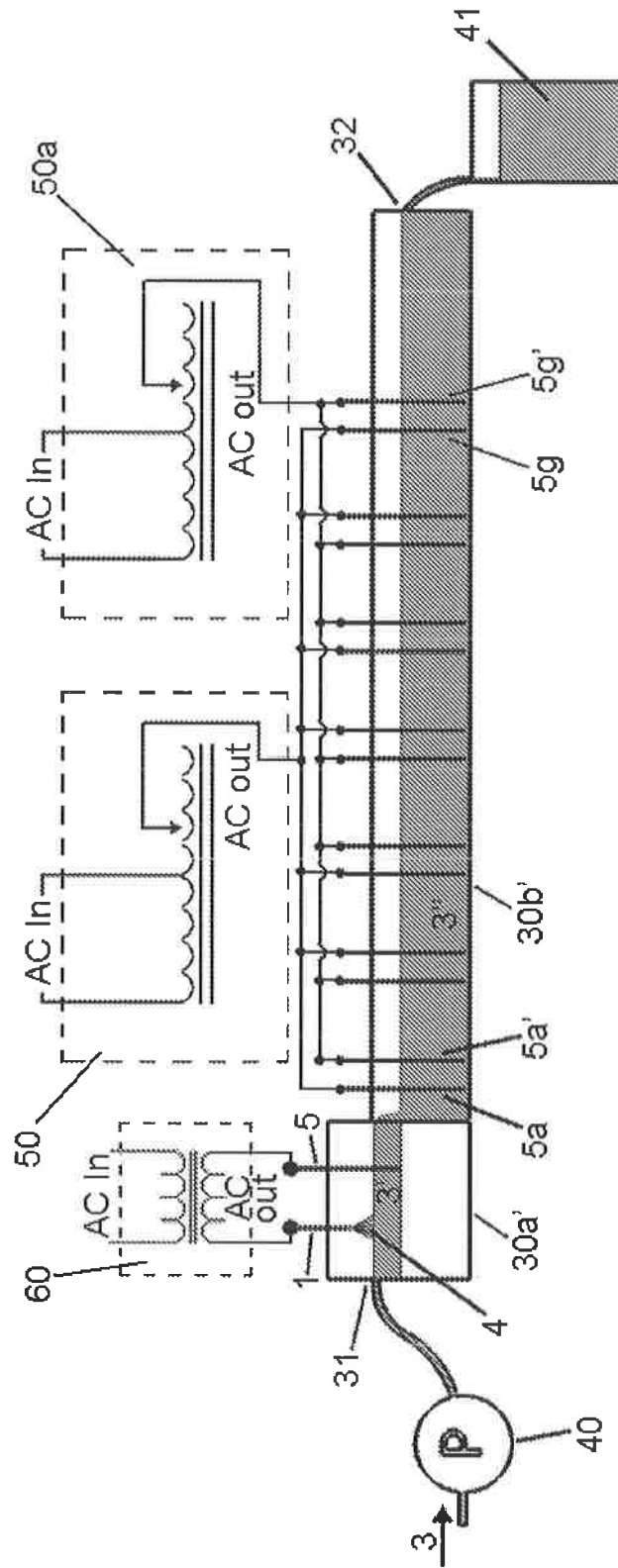


Figure 20d

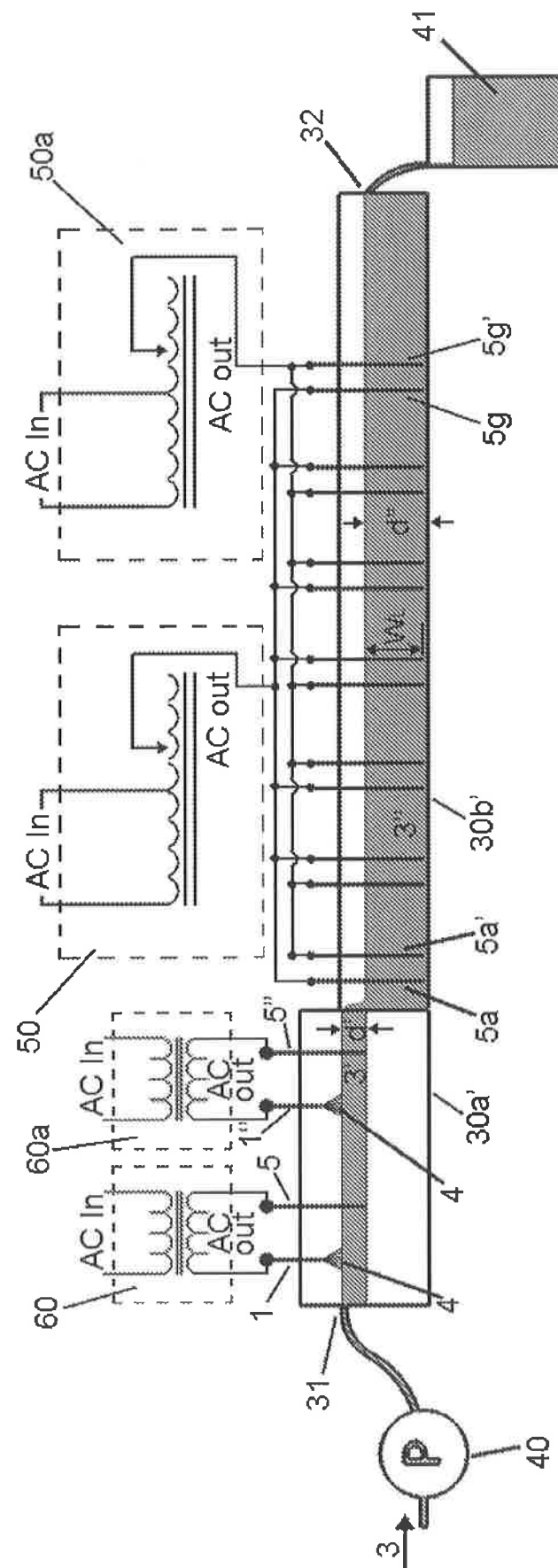


Figure 20e

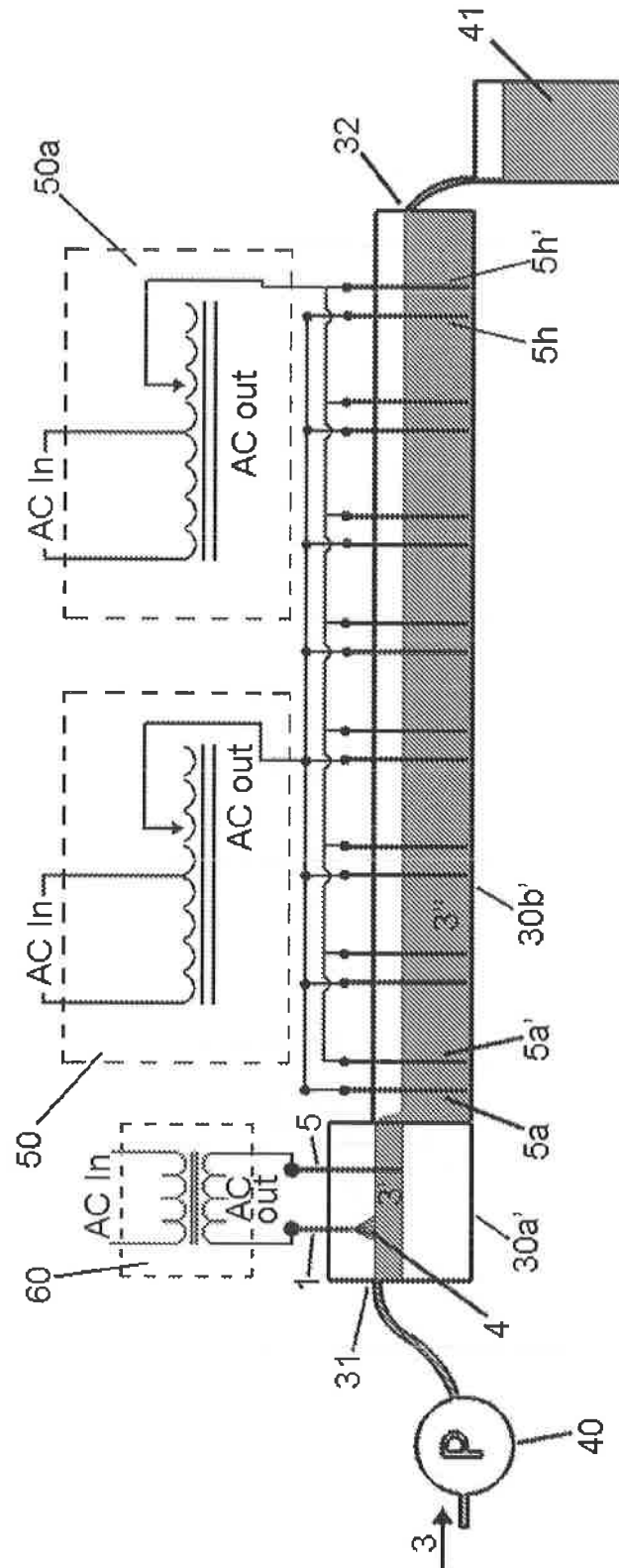


Figure 20f

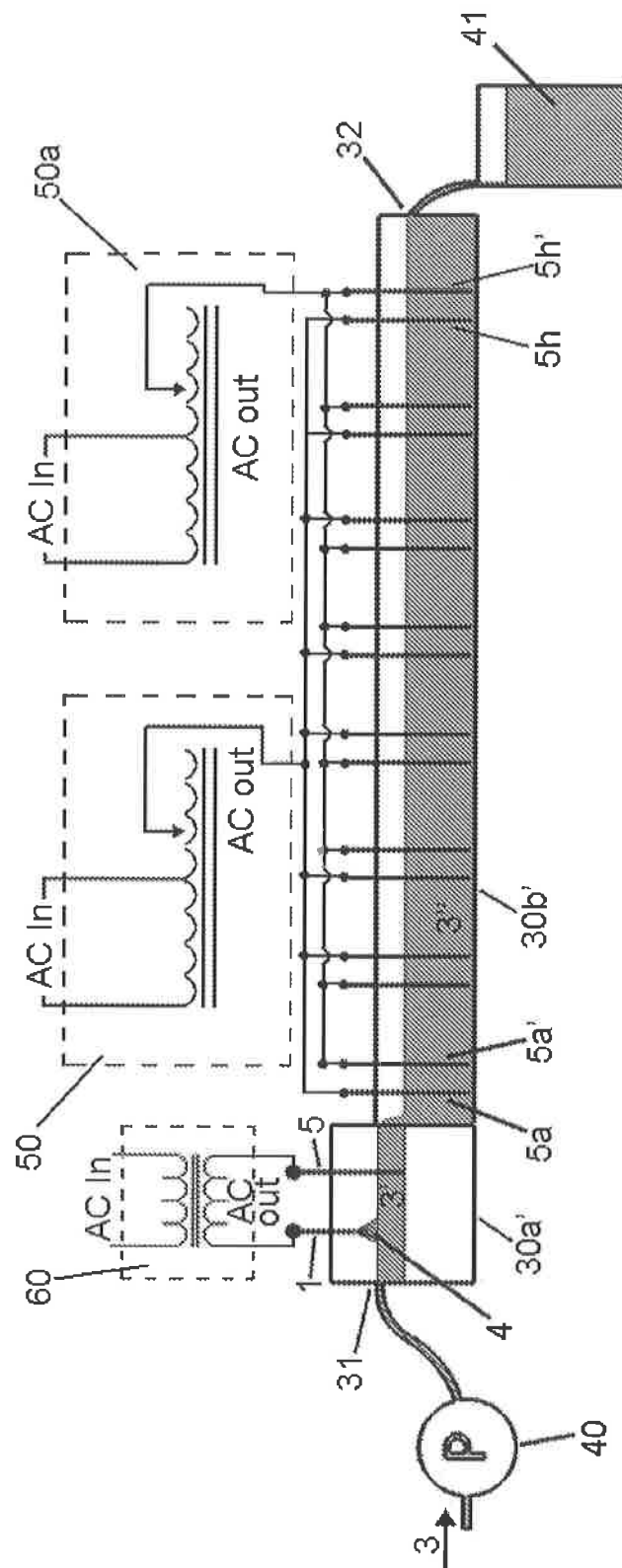
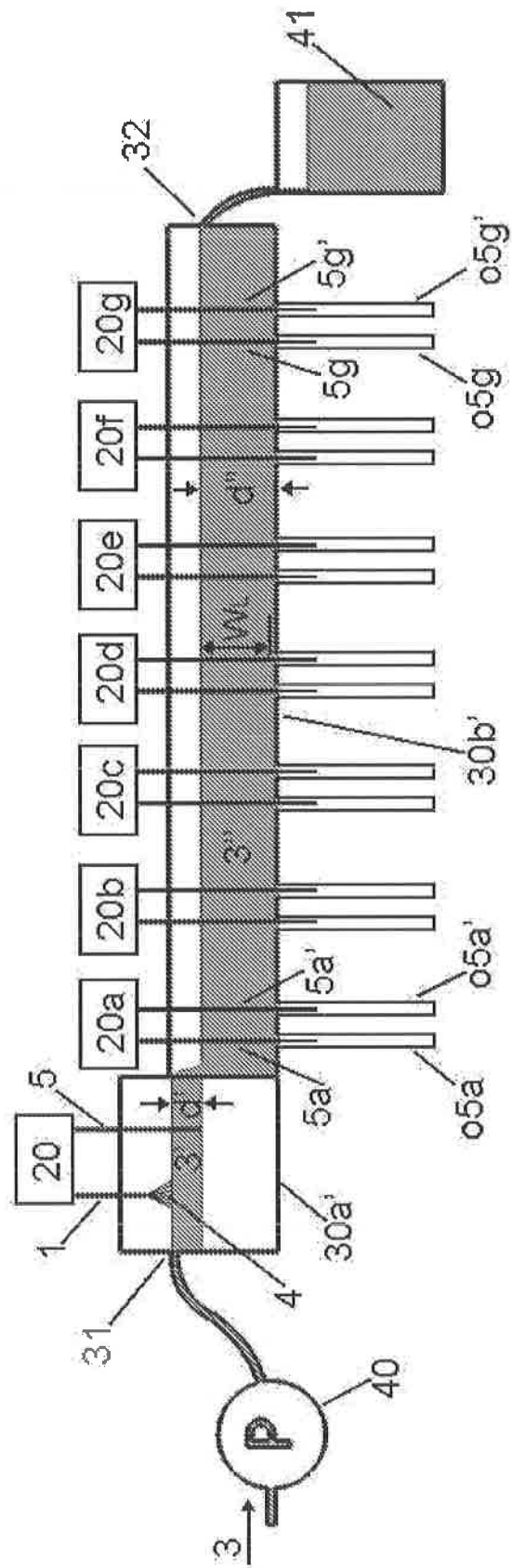


Figure 20g



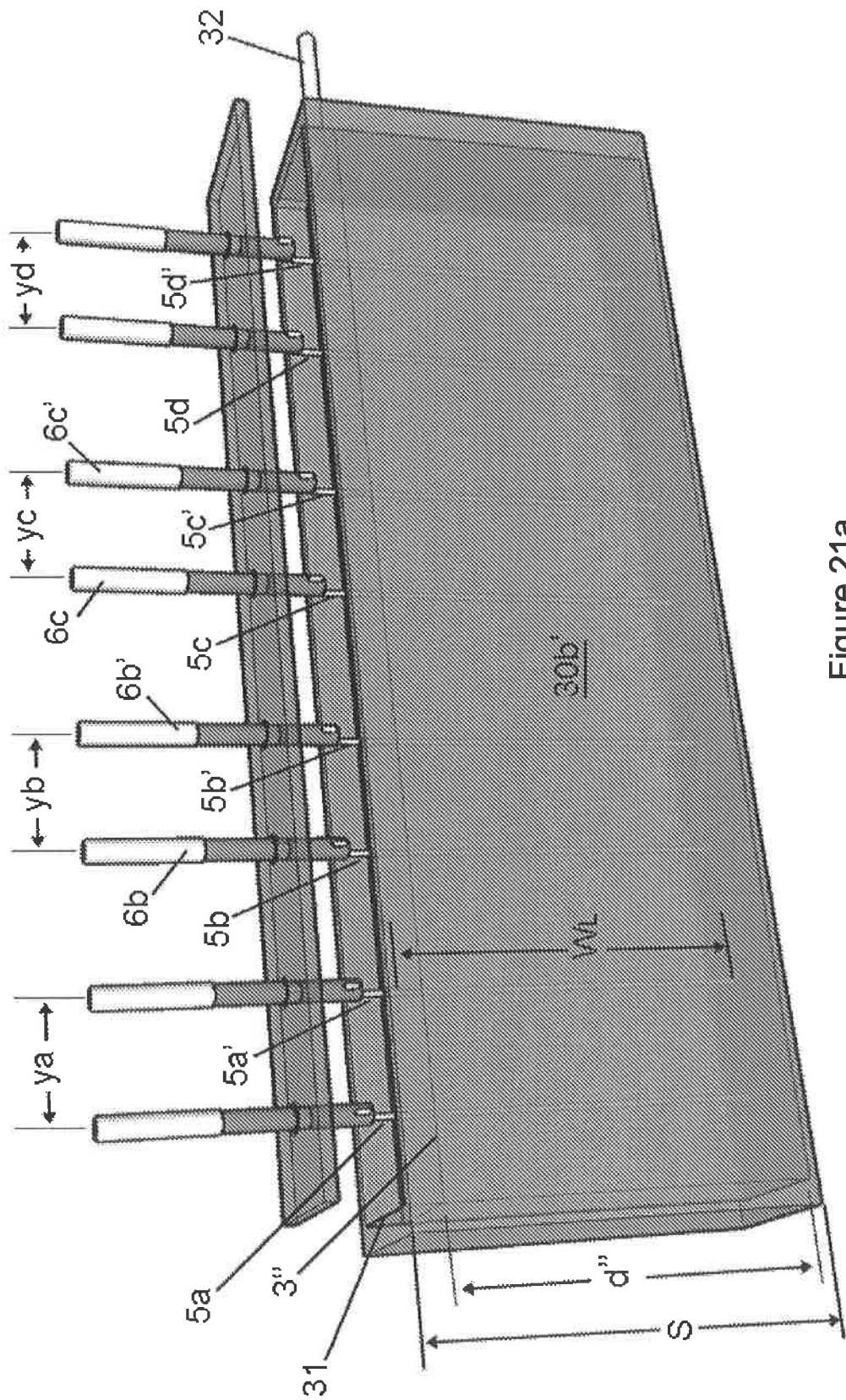


Figure 21a

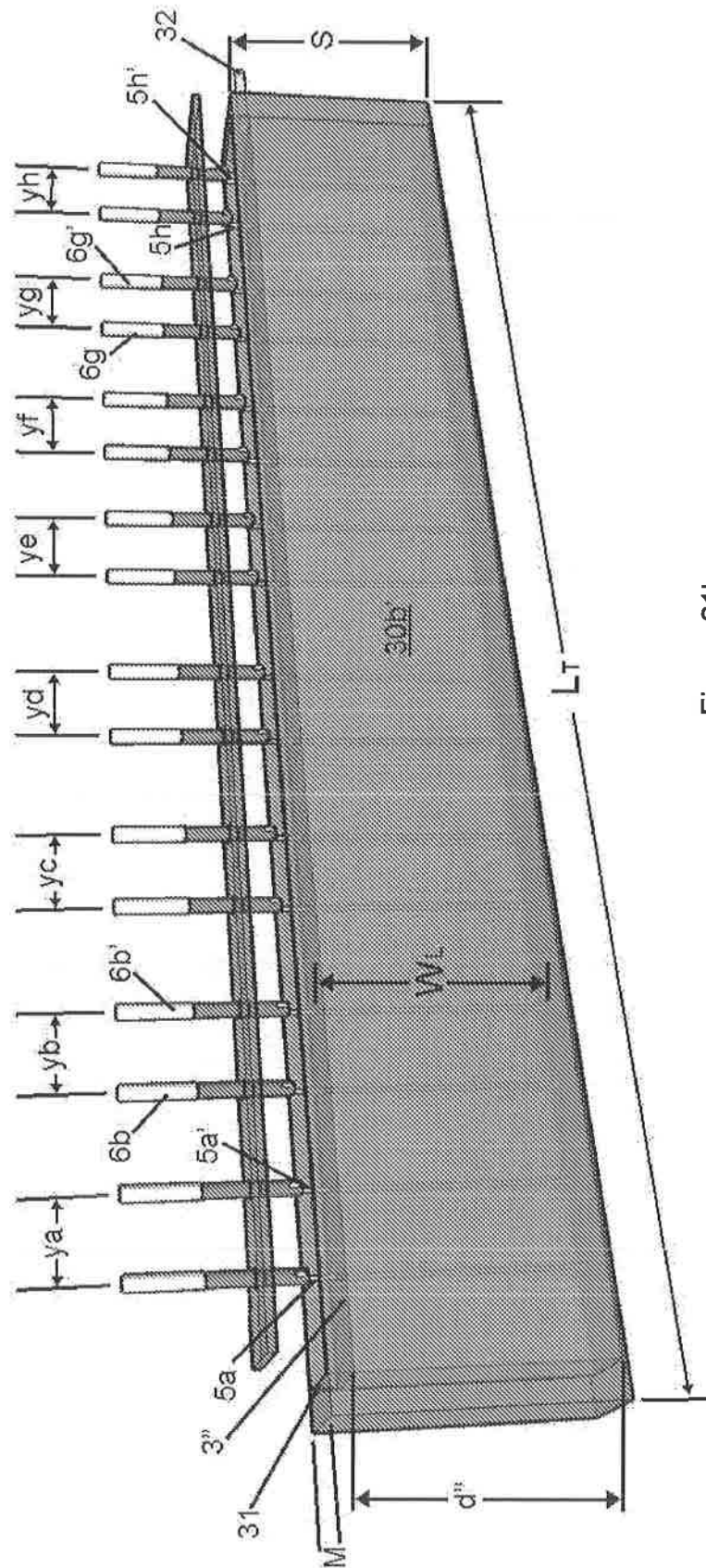


Figure 21b

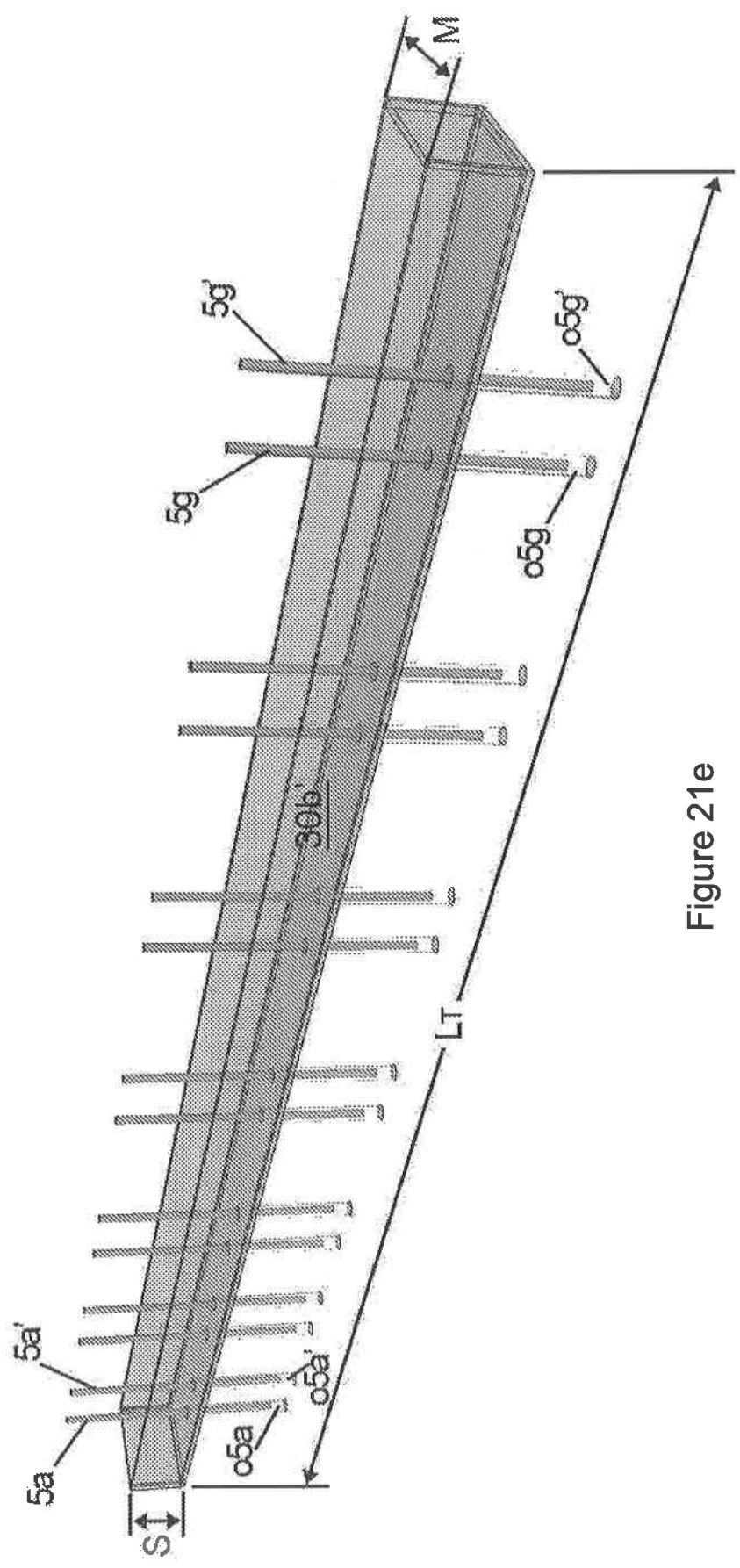


Figure 21e

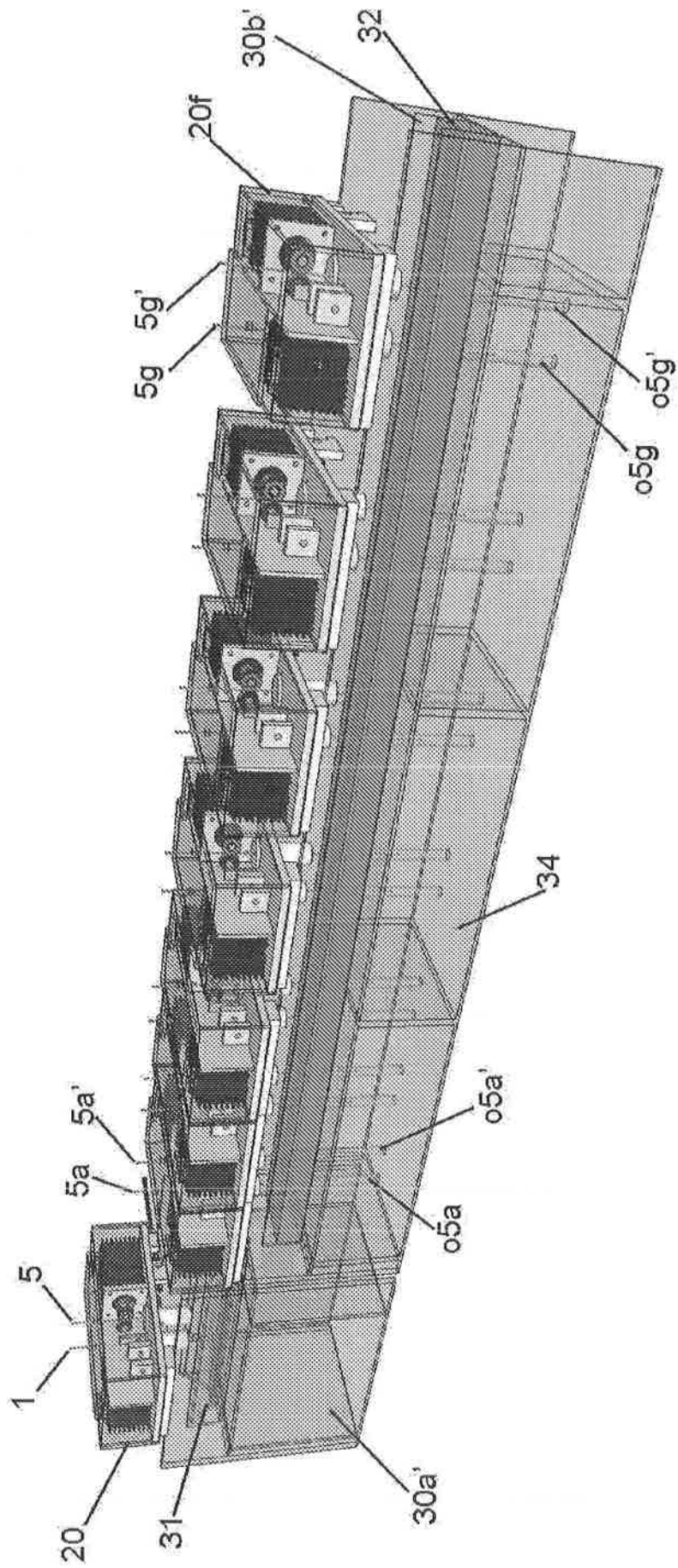


Figure 21f

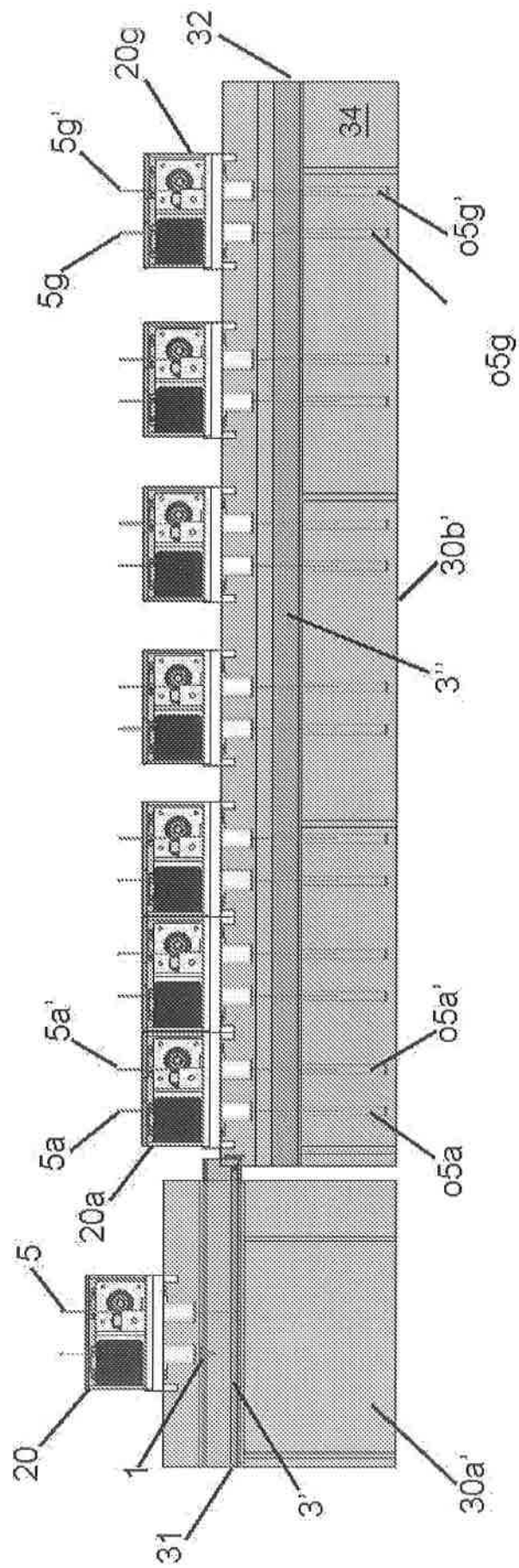


Figure 21g

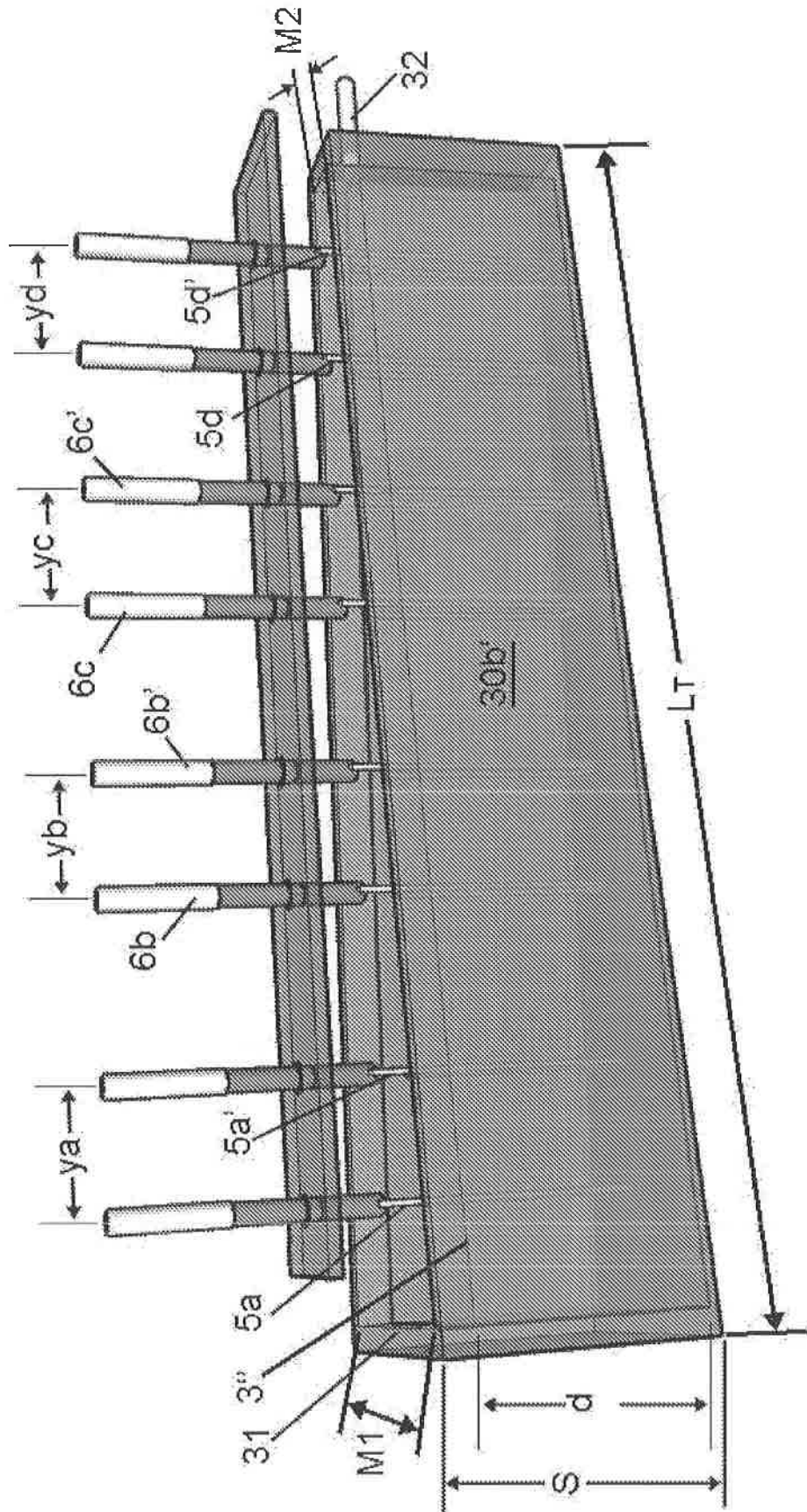


Figure 22a

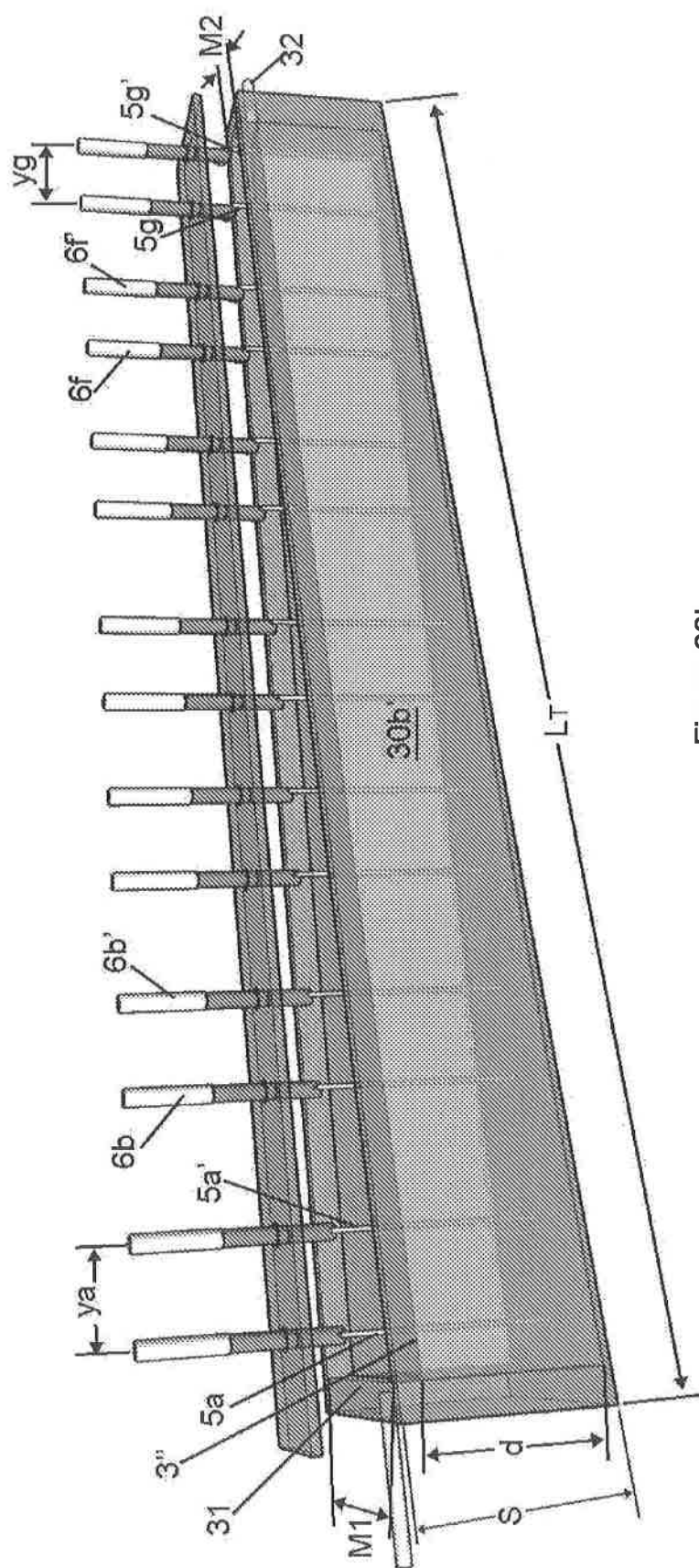


Figure 22b

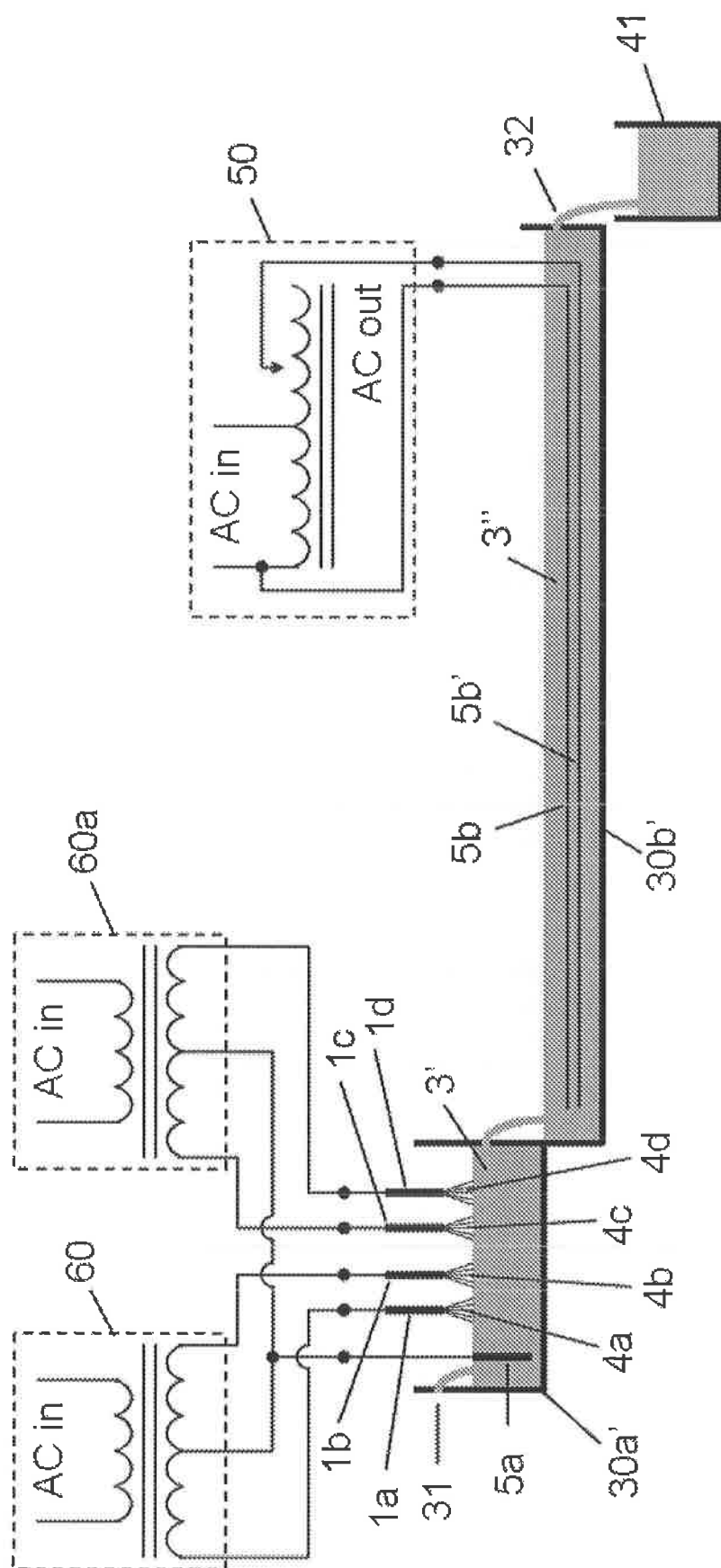


Figure 23a

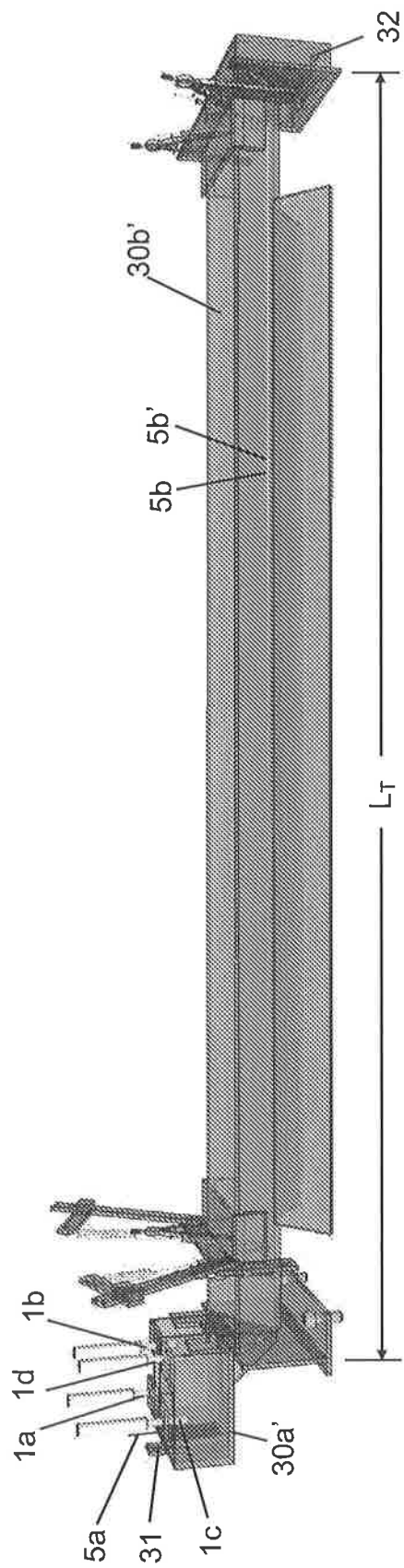


Figure 23b

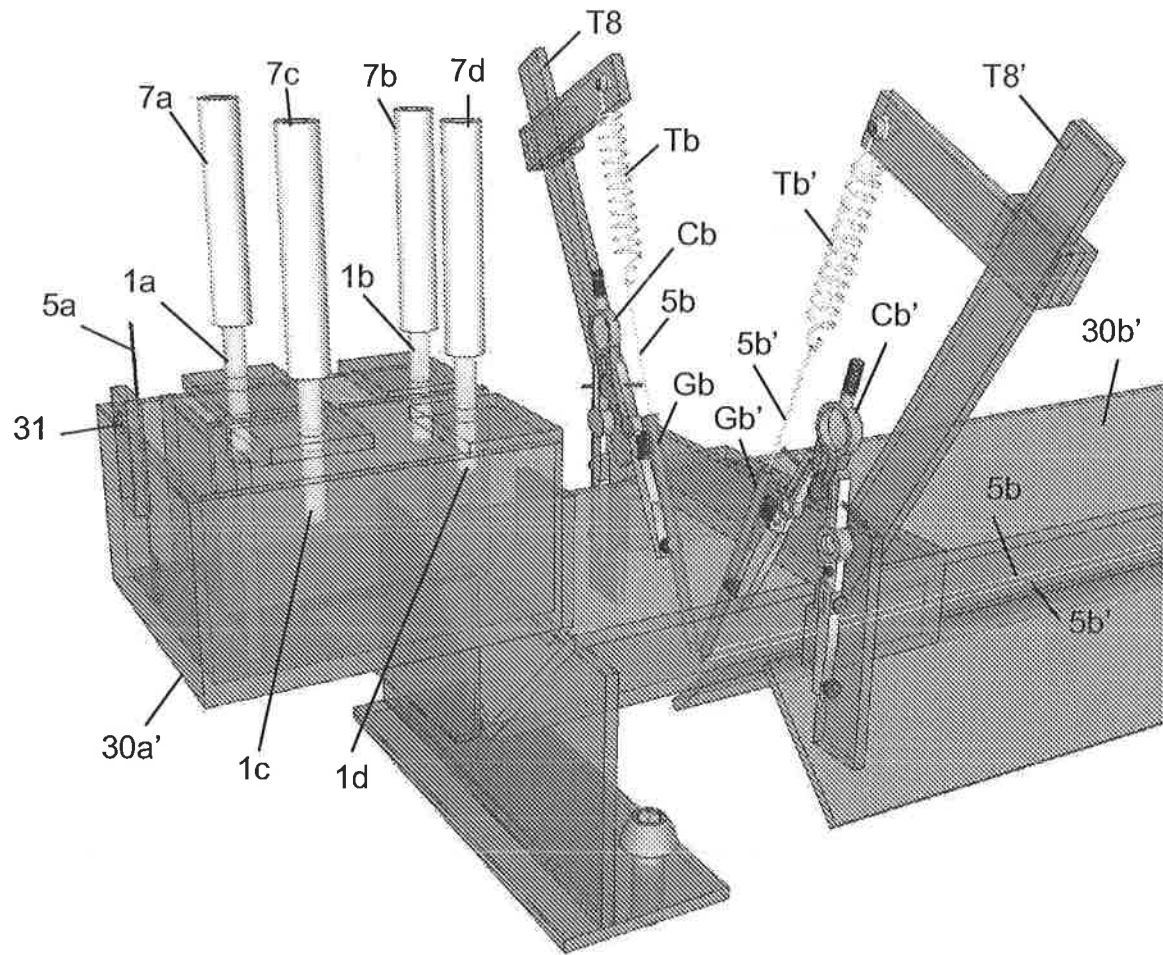


Figure 23c

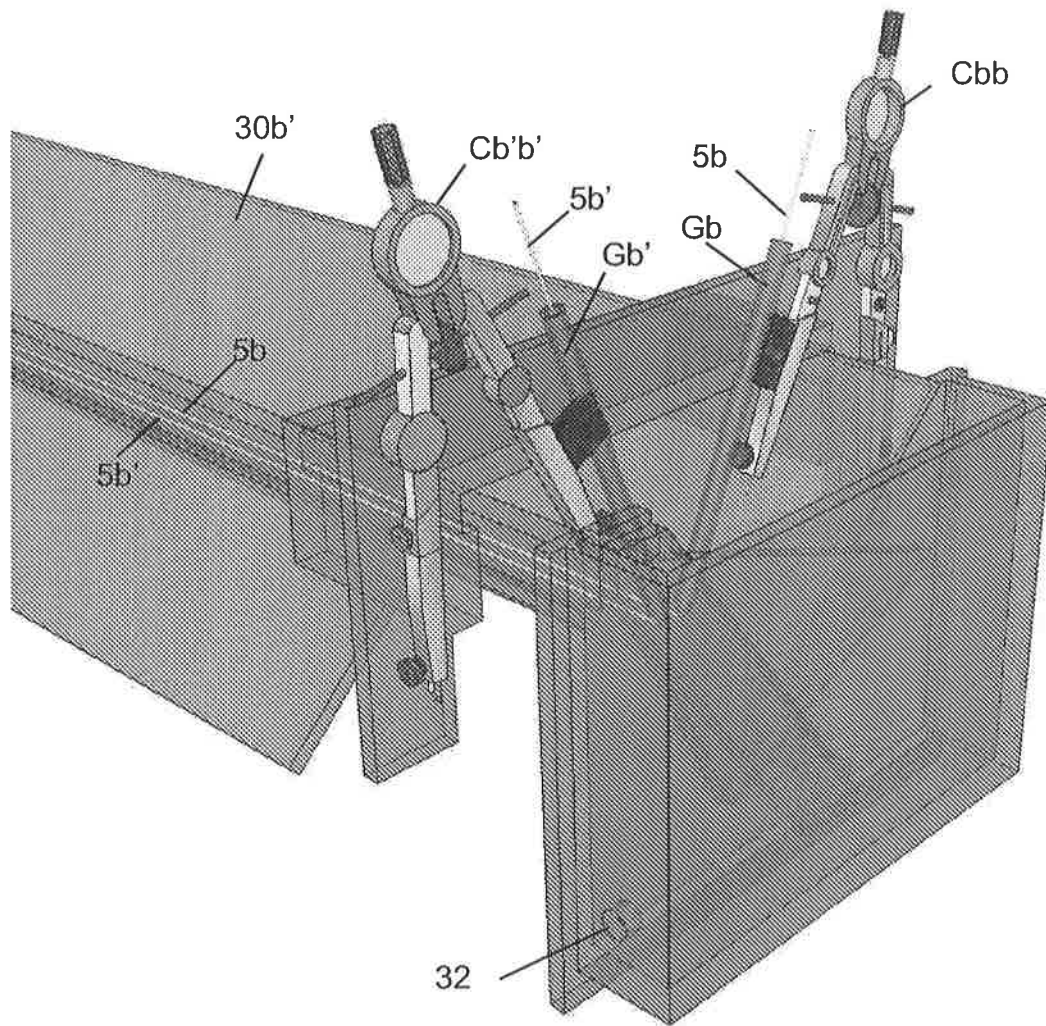


Figure 23d

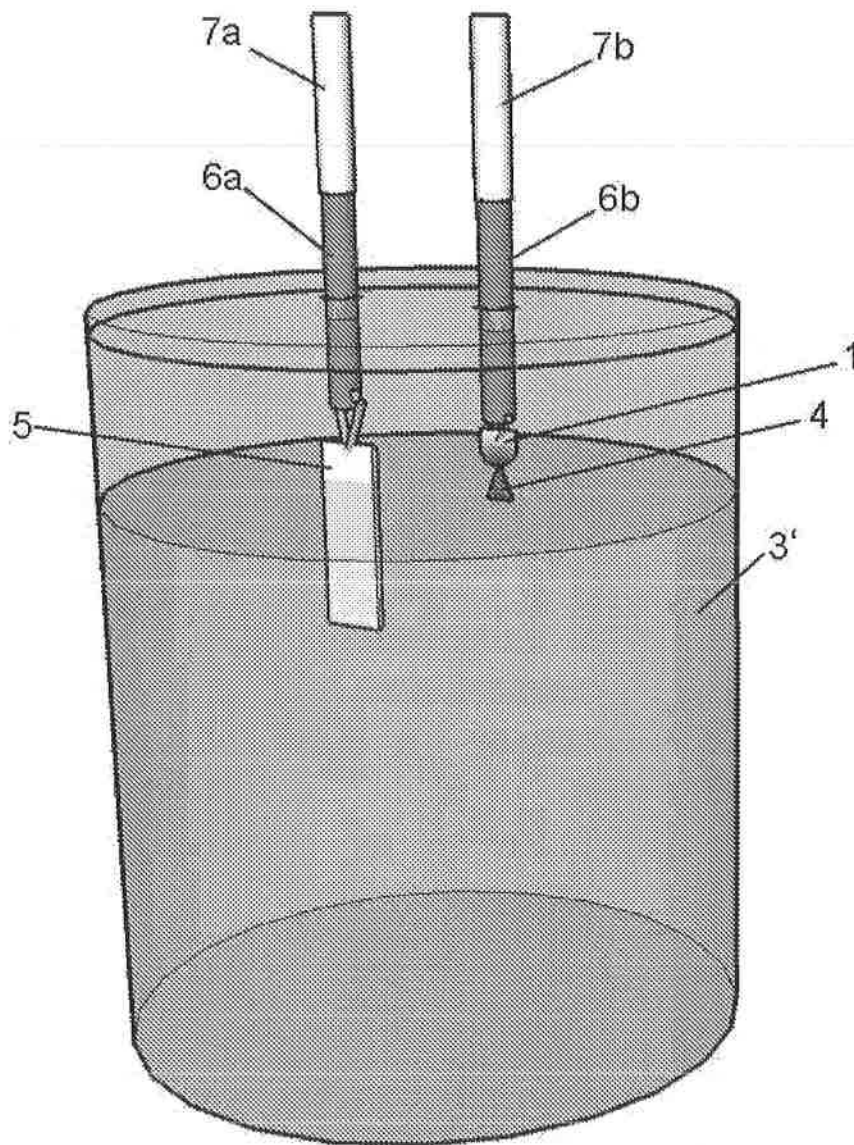


Figure 24a

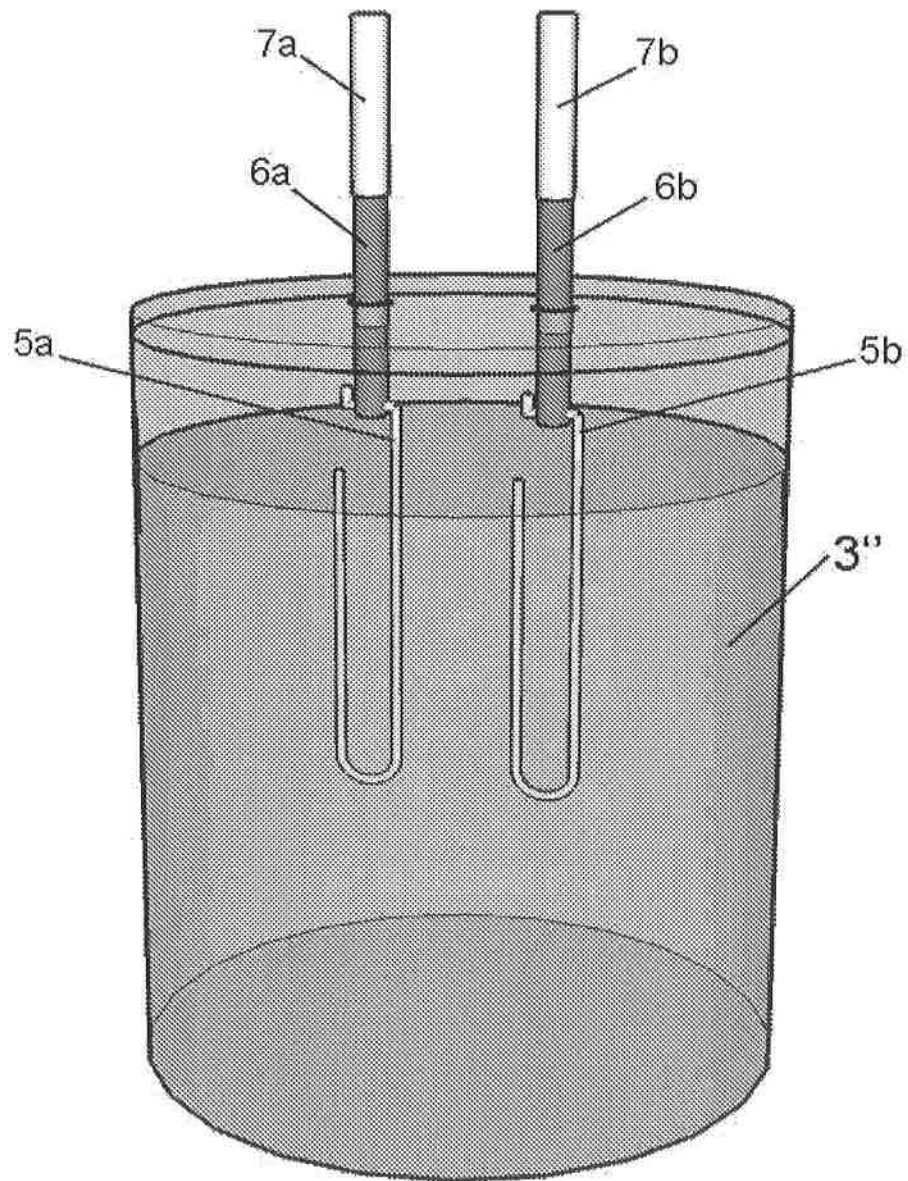


Figure 24b

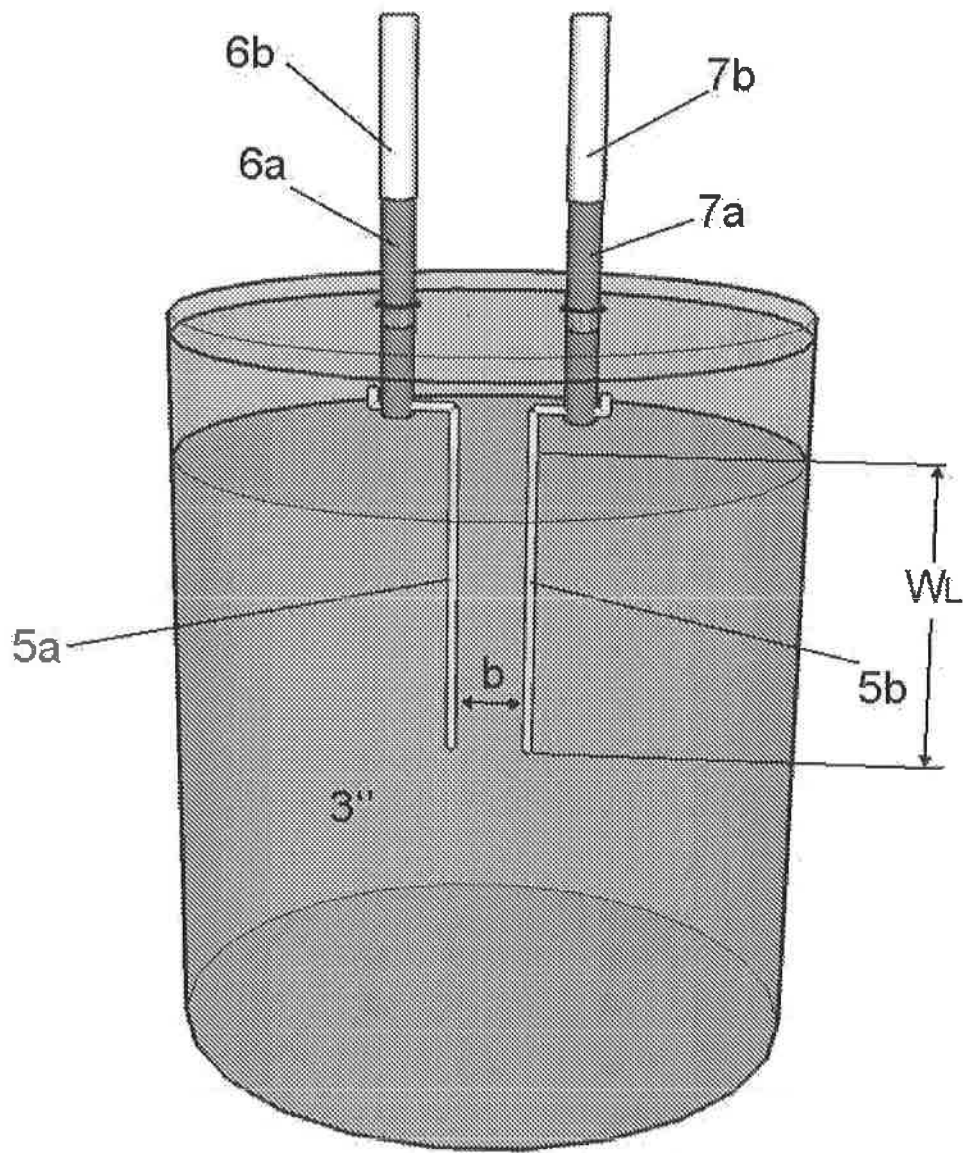


Figure 24c

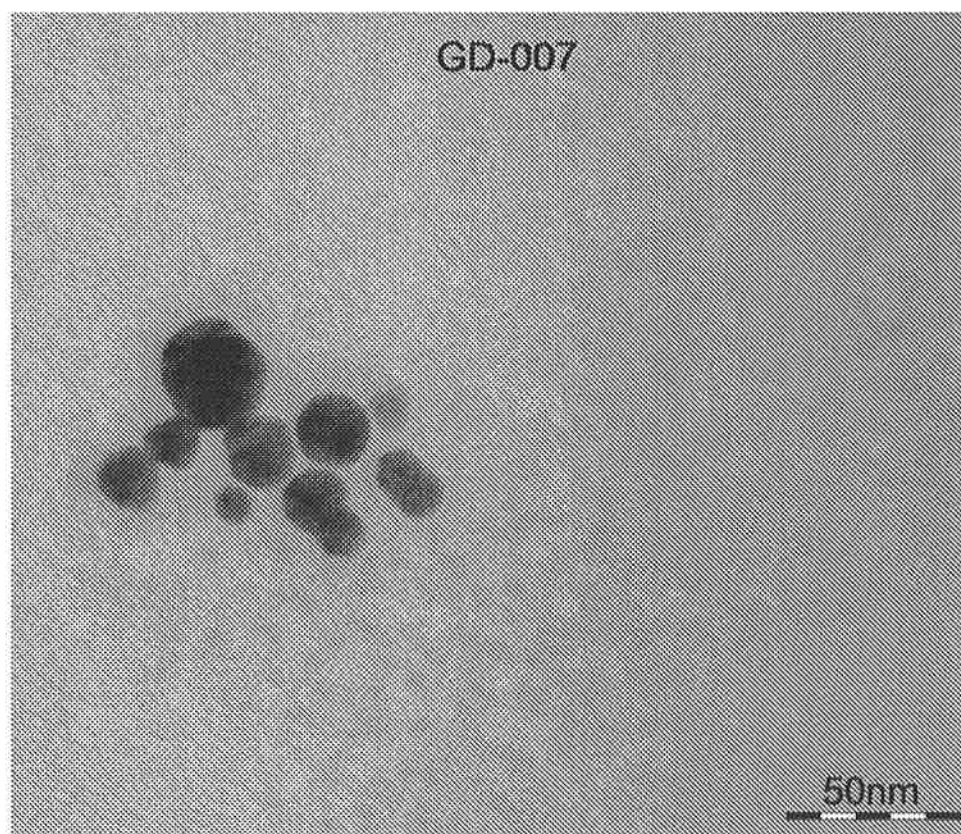


Figure 25a

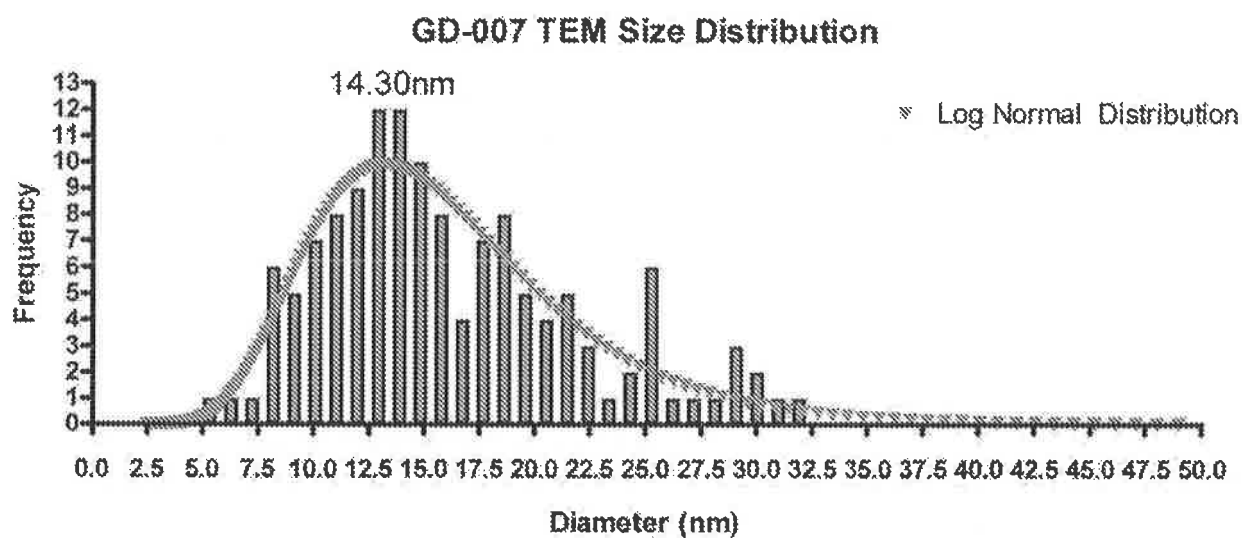


Figure 25b

Au GD-007-02
13.05% transmission

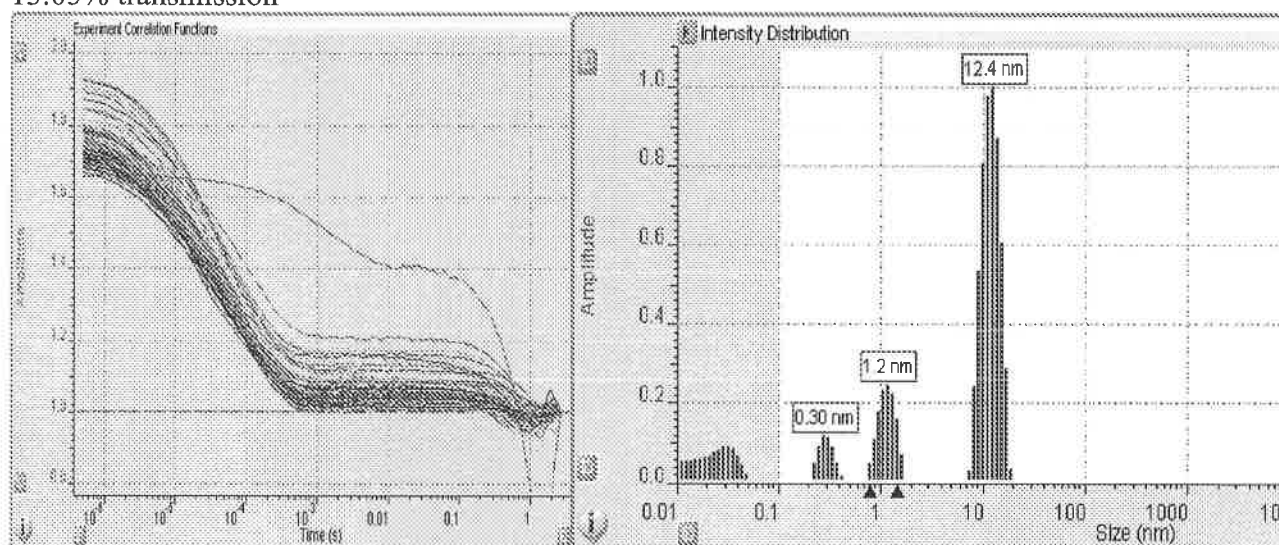


Figure 25c

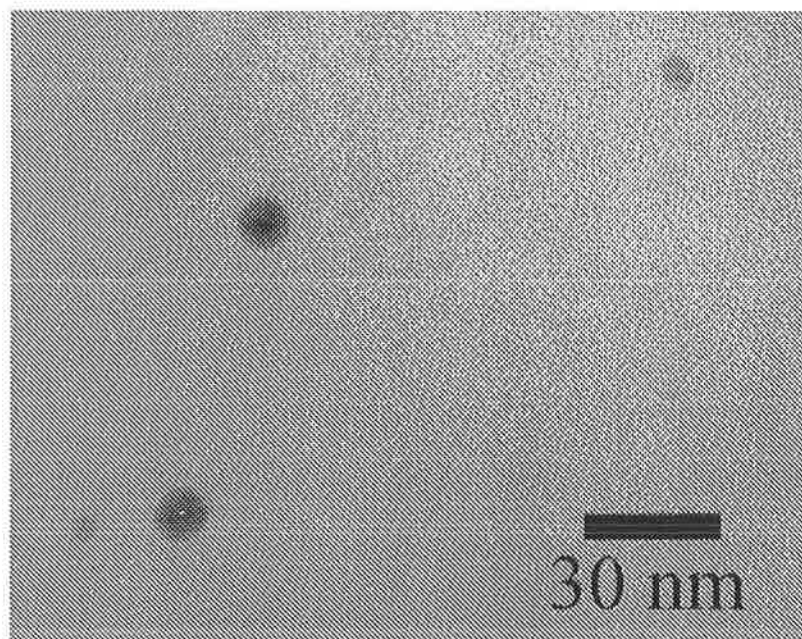
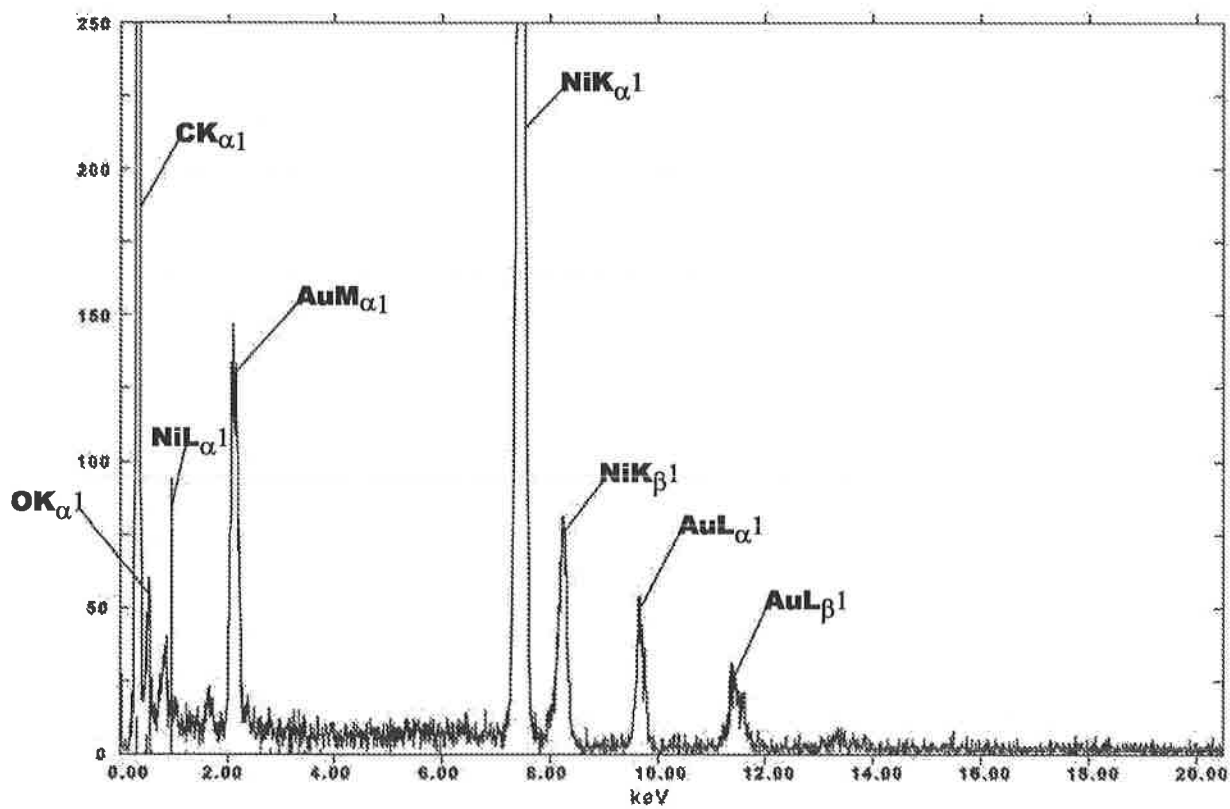
**Figure 25d****Figure 25e**

Figure 25f

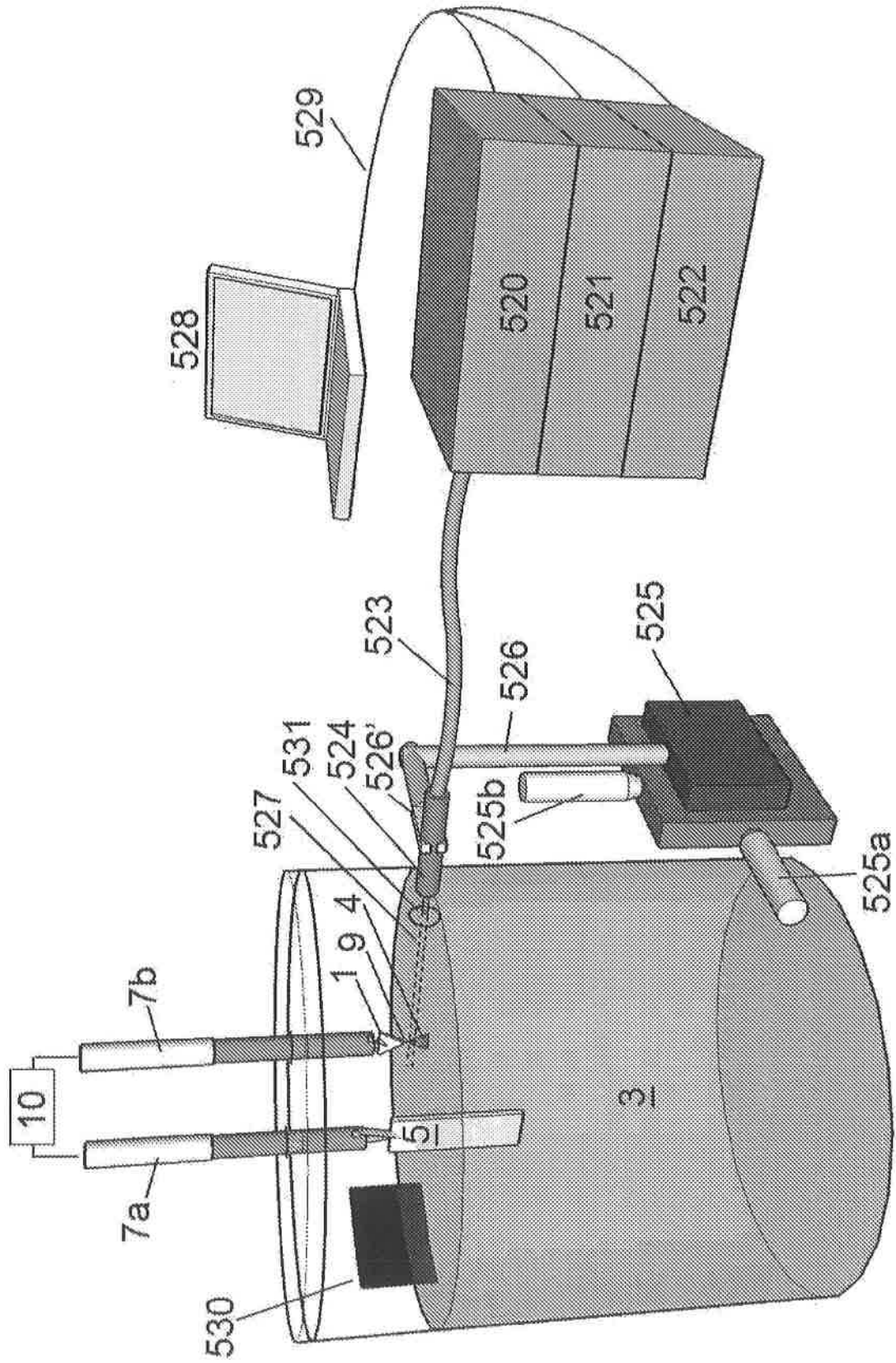


Figure 25g. Au Electrode Plasma Irradiance

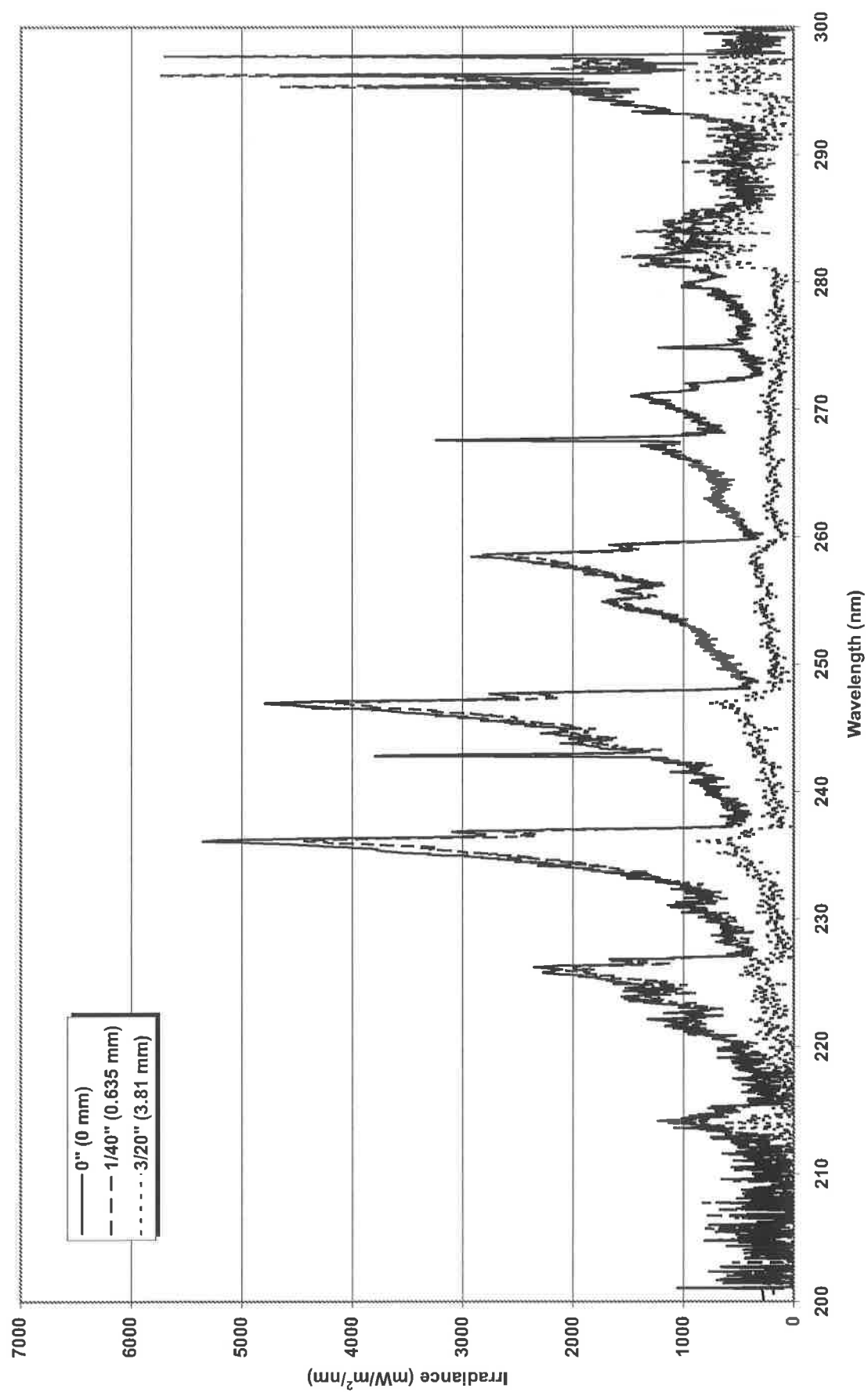


Figure 25h. Au I Spectra

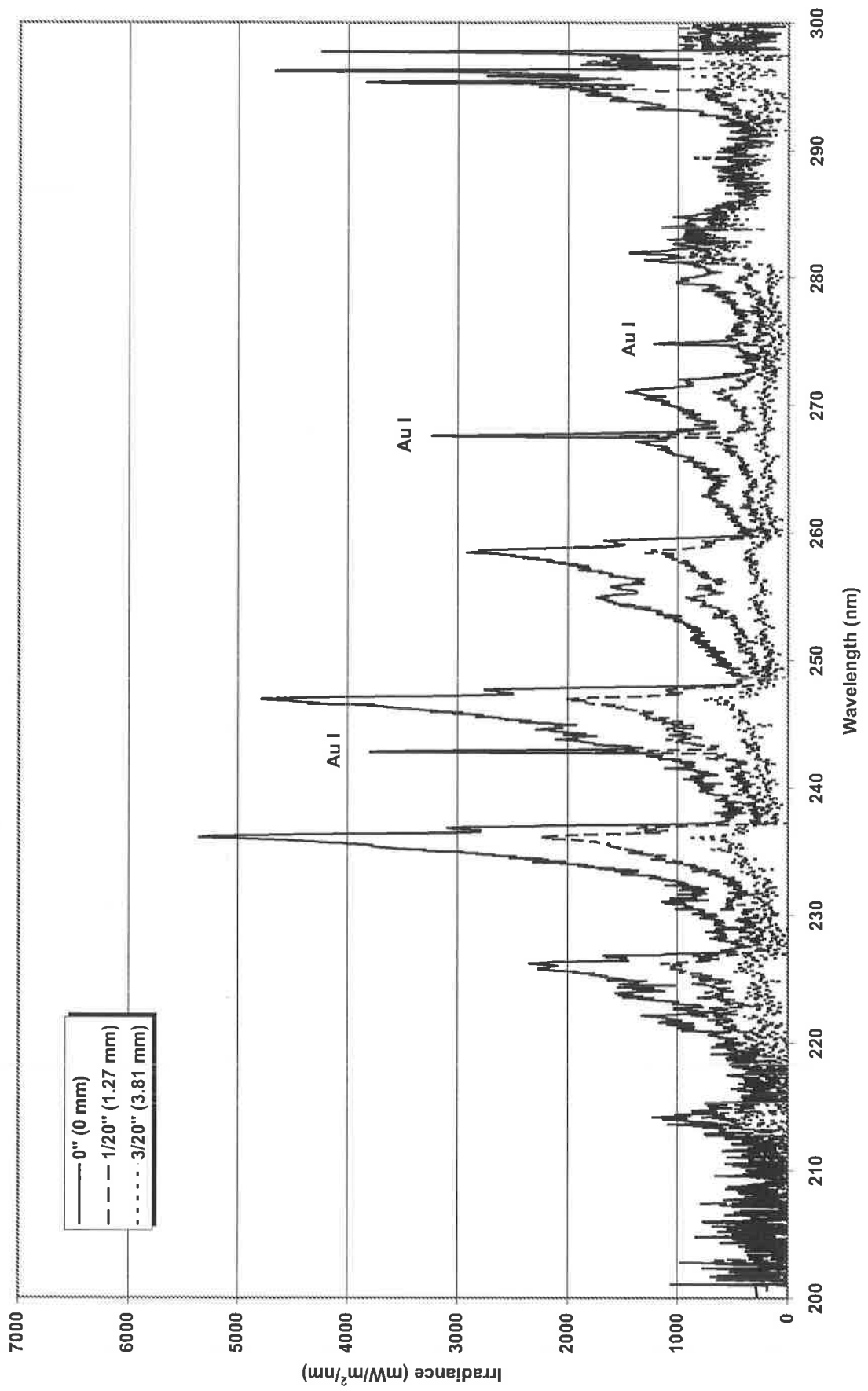


Figure 25i. Au Electrode Plasma Irradiance

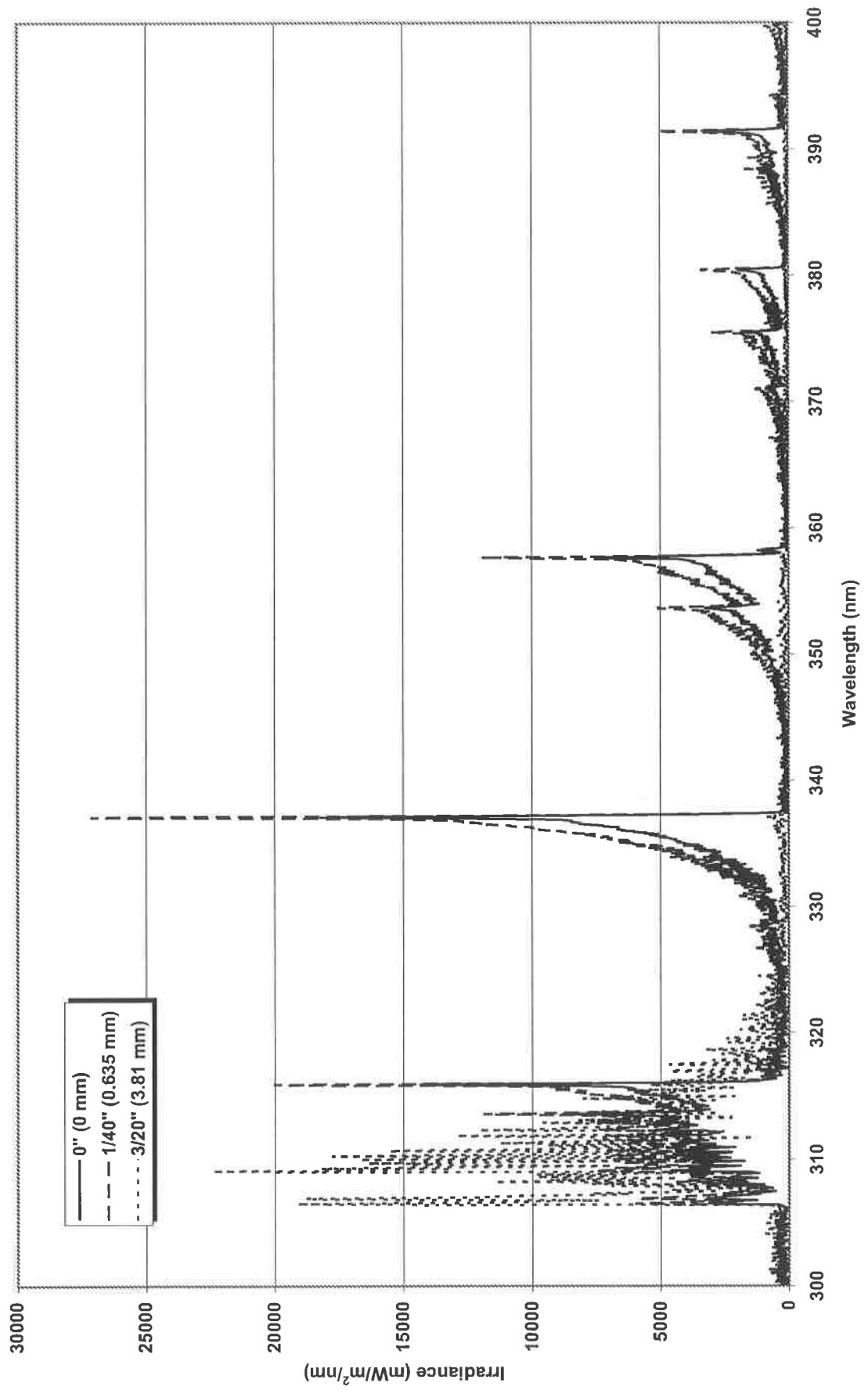
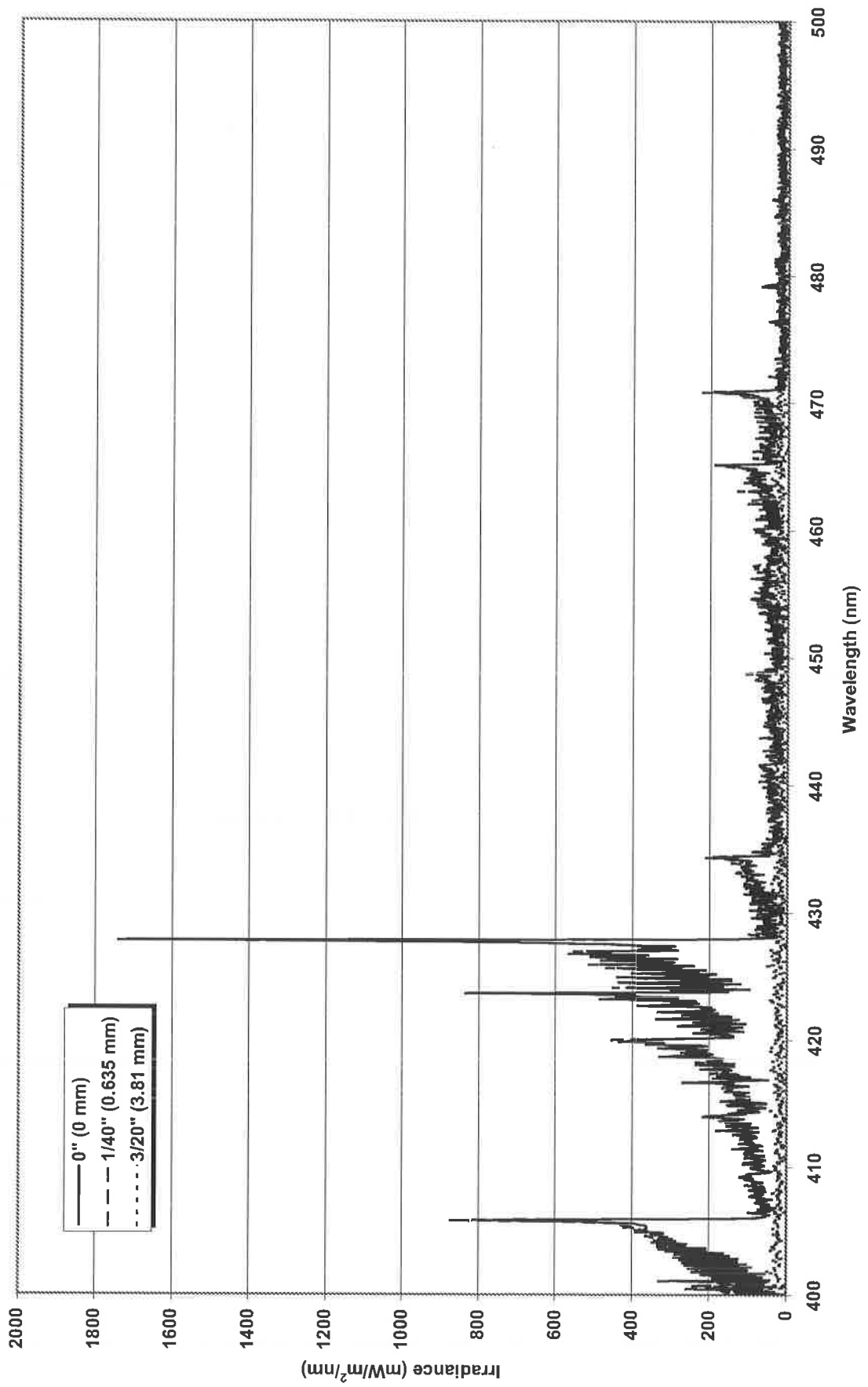


Figure 25j. Au Electrode Plasma Irradiance



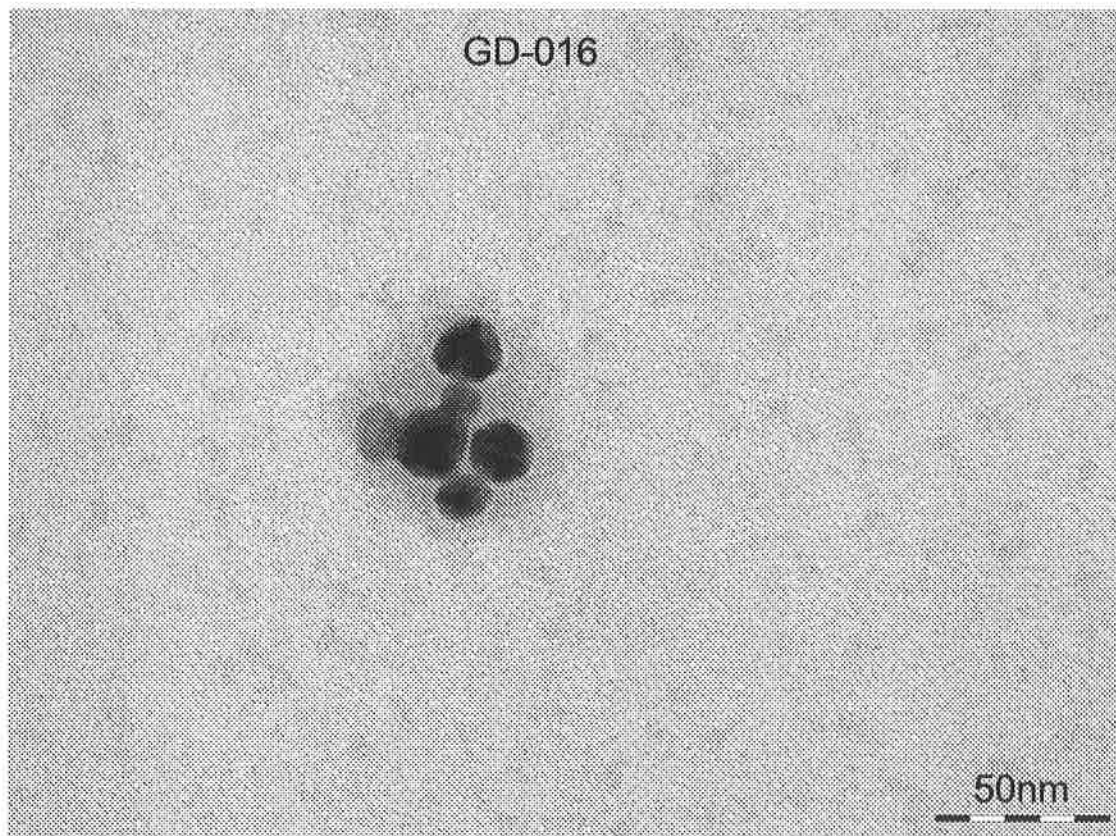


Figure 26a

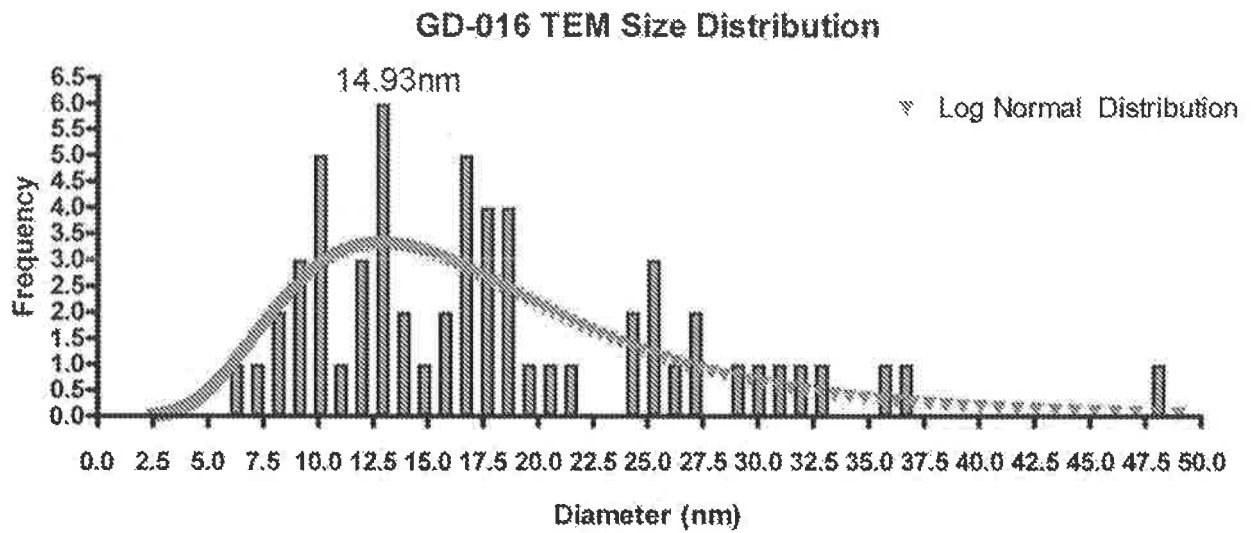


Figure 26b

Gold GD-016
5.46% transmission

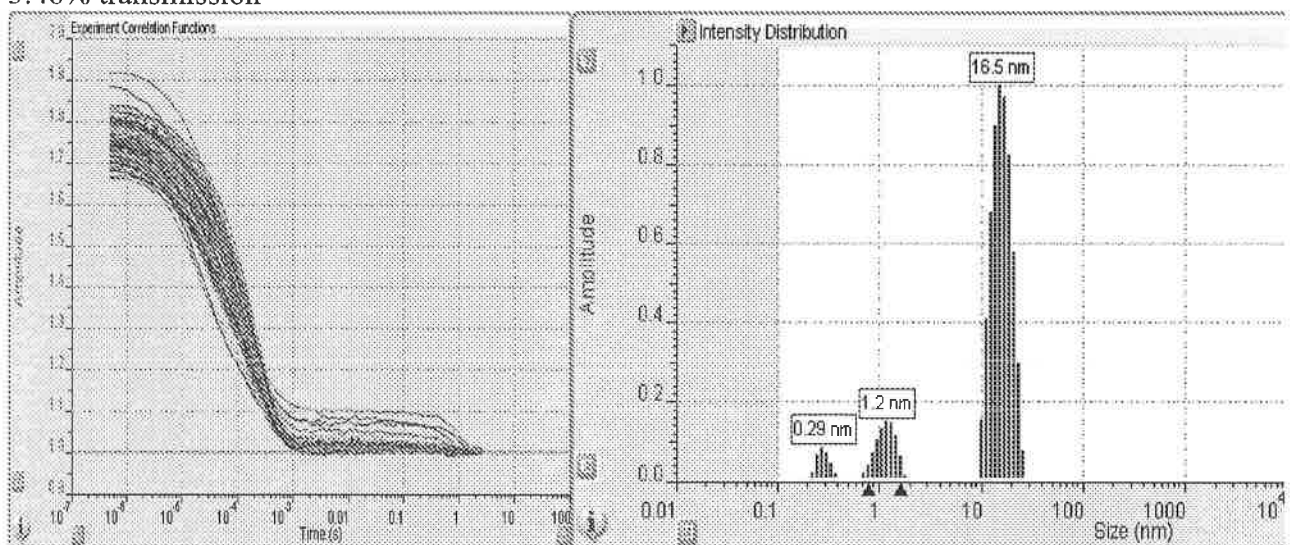


Figure 26c

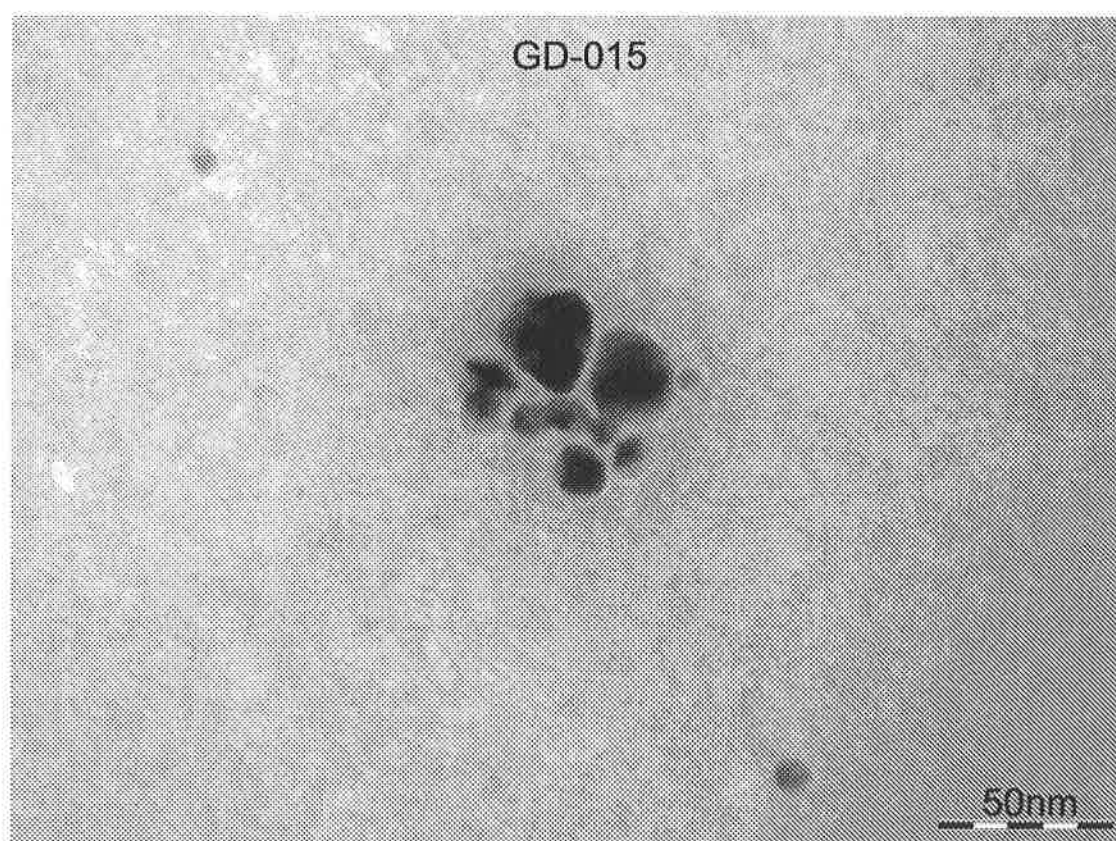


Figure 27a

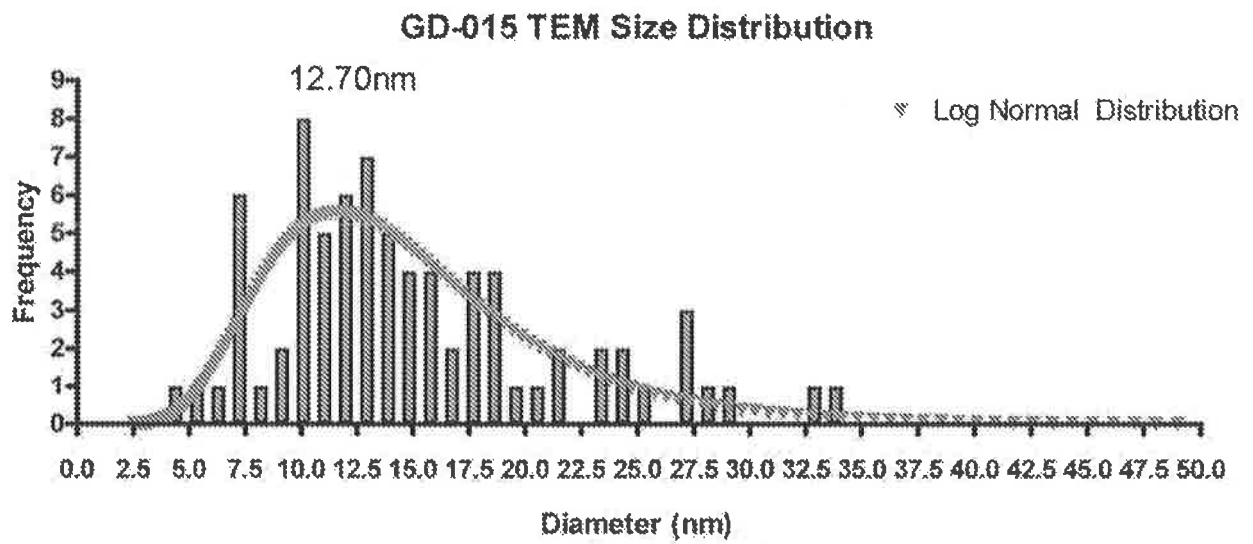


Figure 27b

Gold GD-015
5.72% transmission

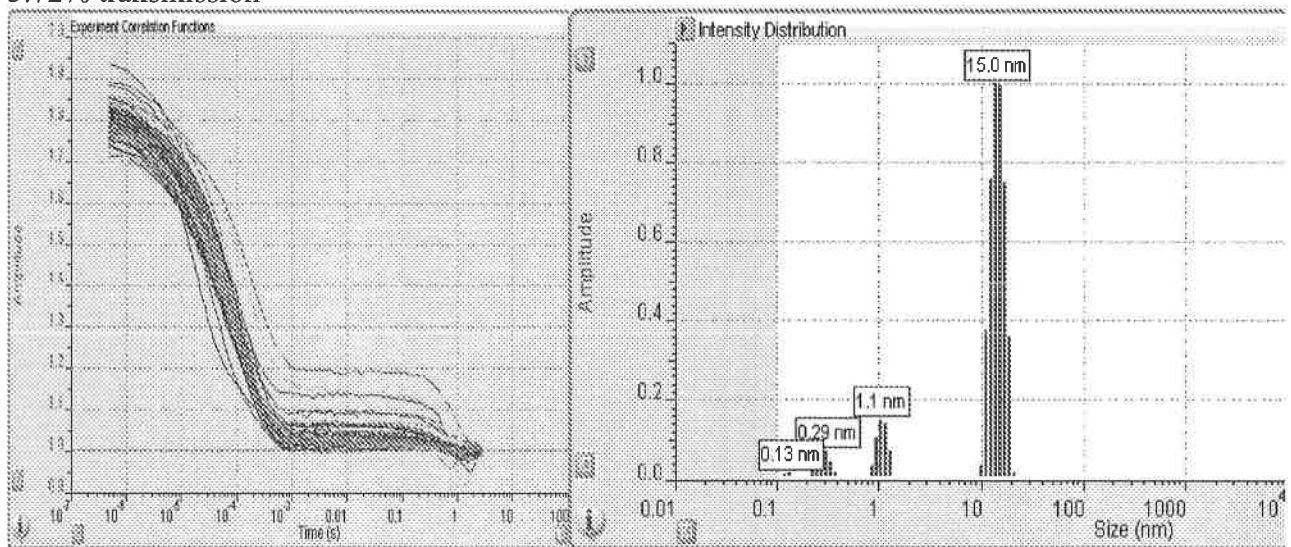


Figure 27c

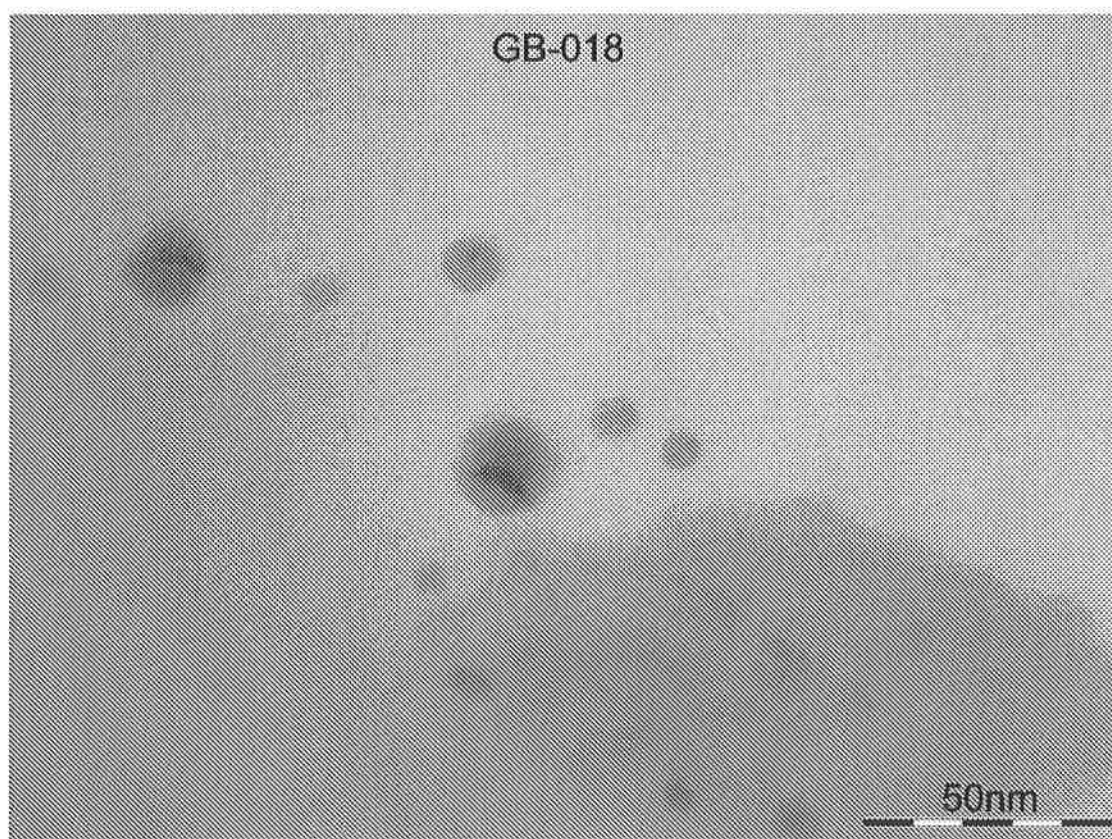


Figure 28a

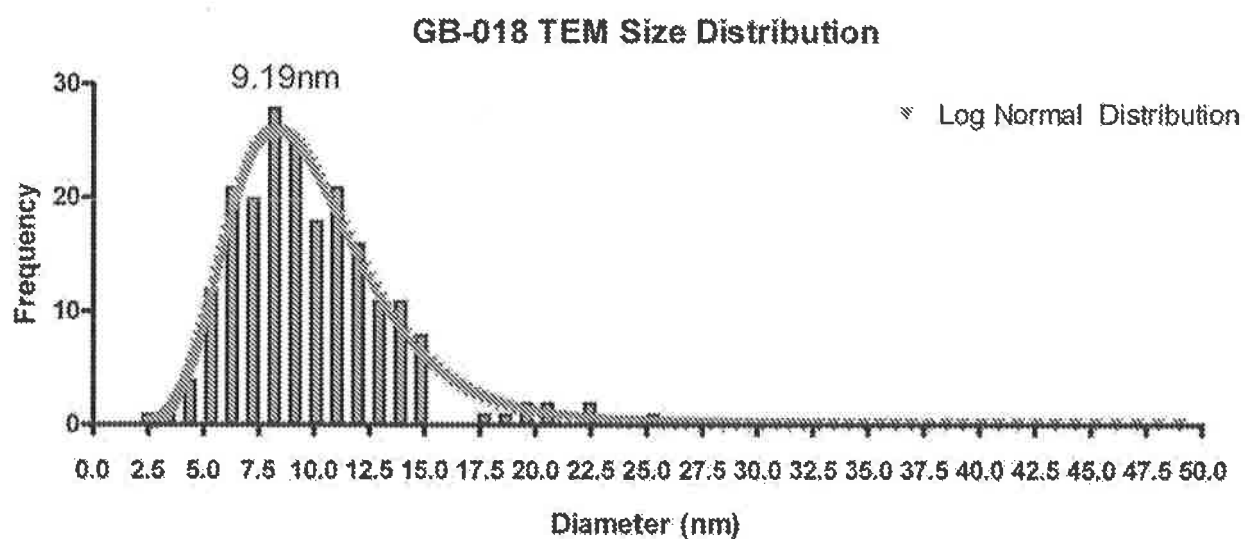


Figure 28b

GB-018
48.60% transmission

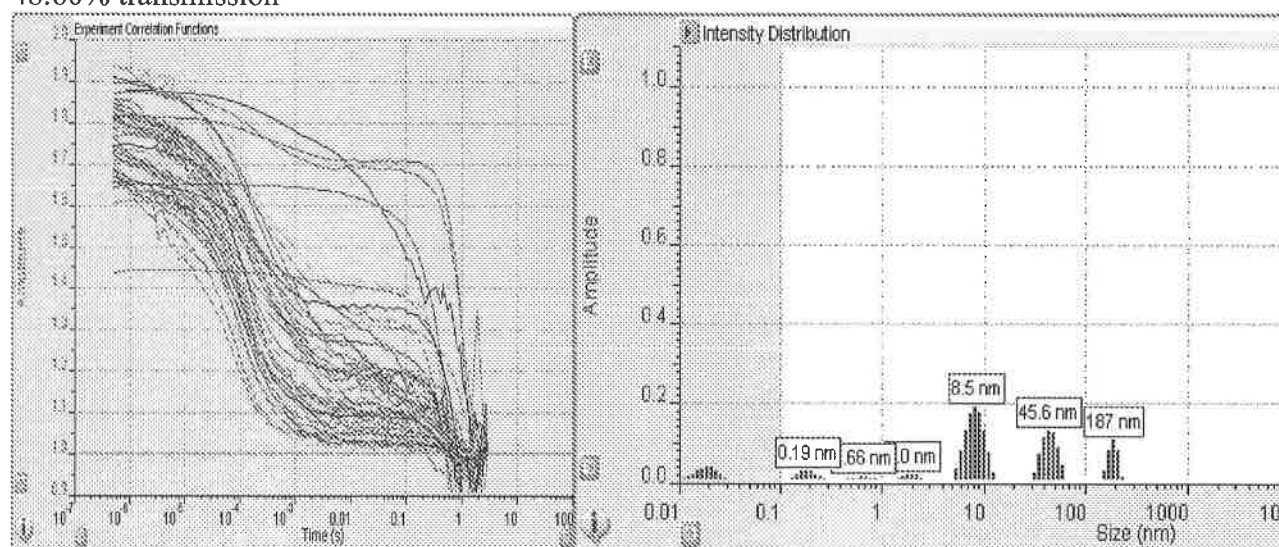


Figure 28c

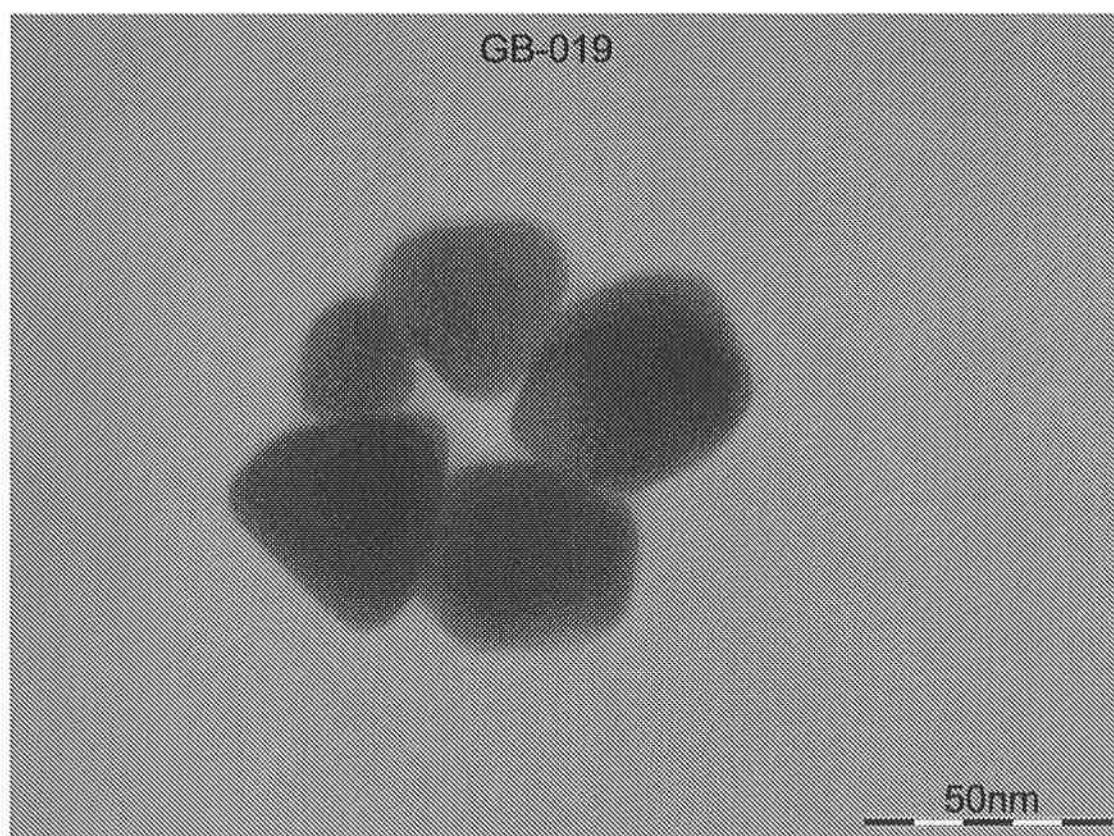


Figure 29a

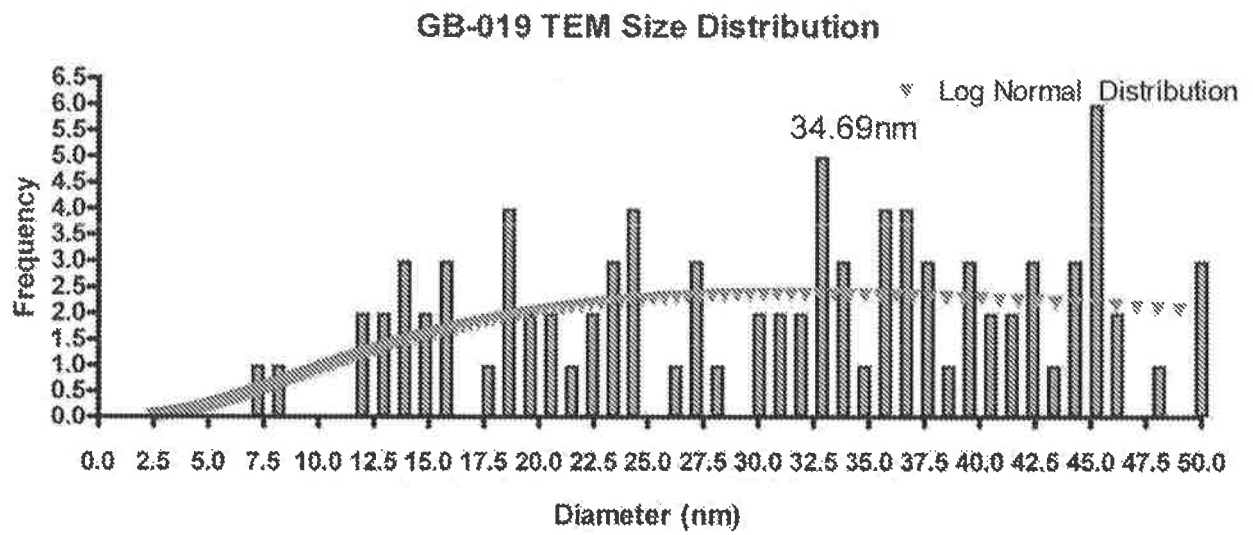


Figure 29b

GB-019
0.81% transmission

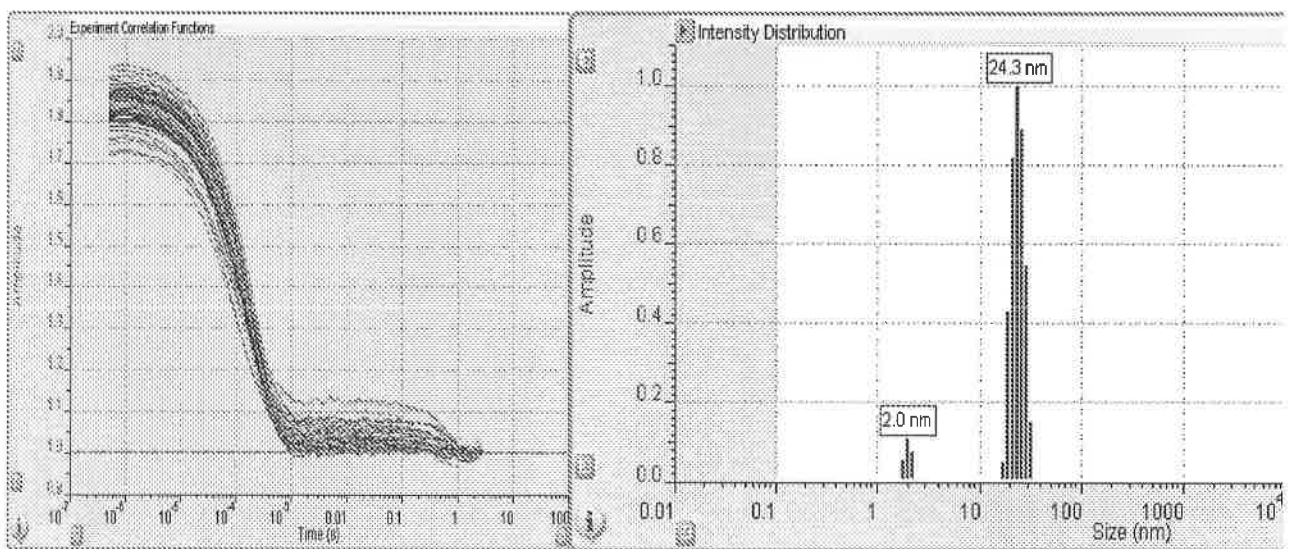


Figure 29c

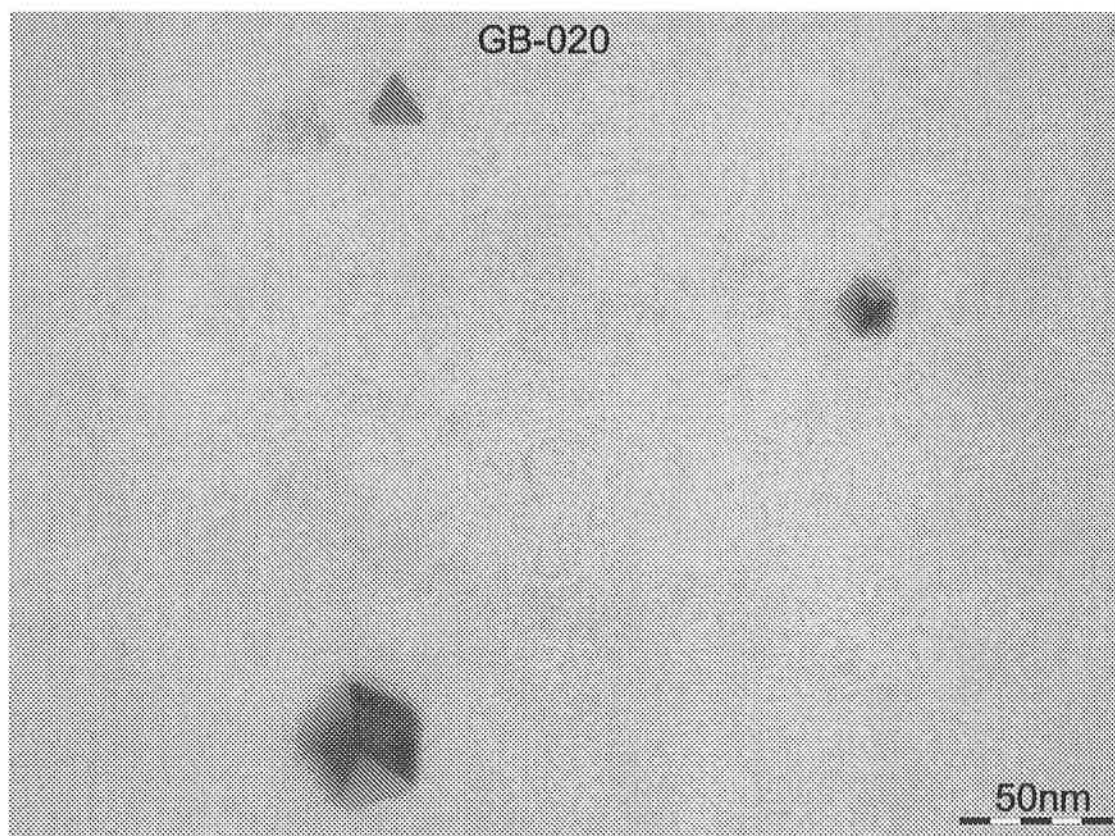


Figure 30a

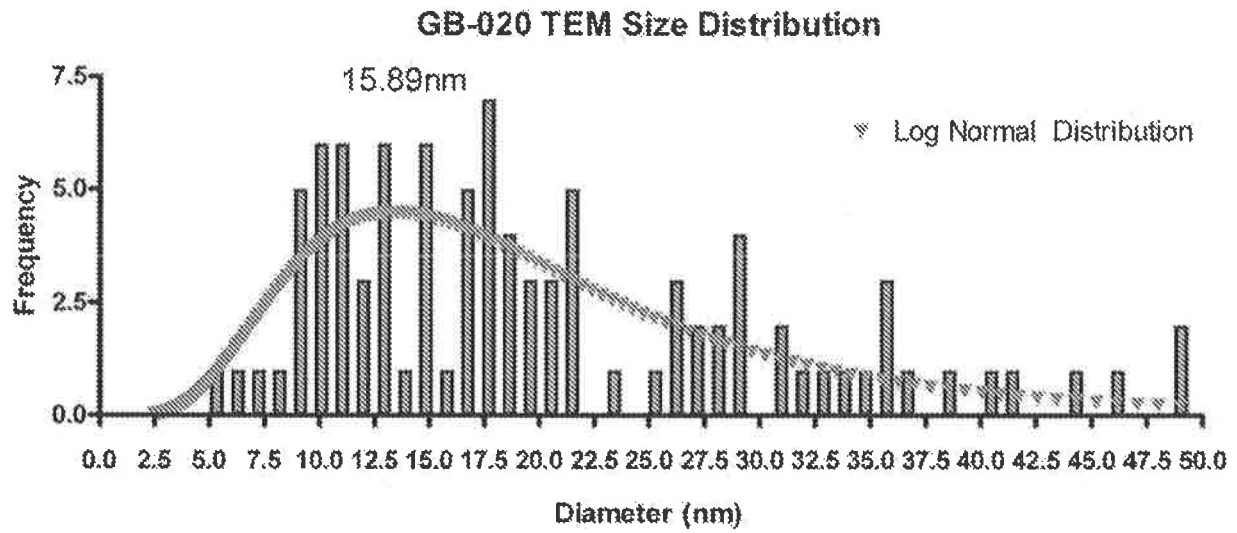


Figure 30b

GB-020
2.26% transmission

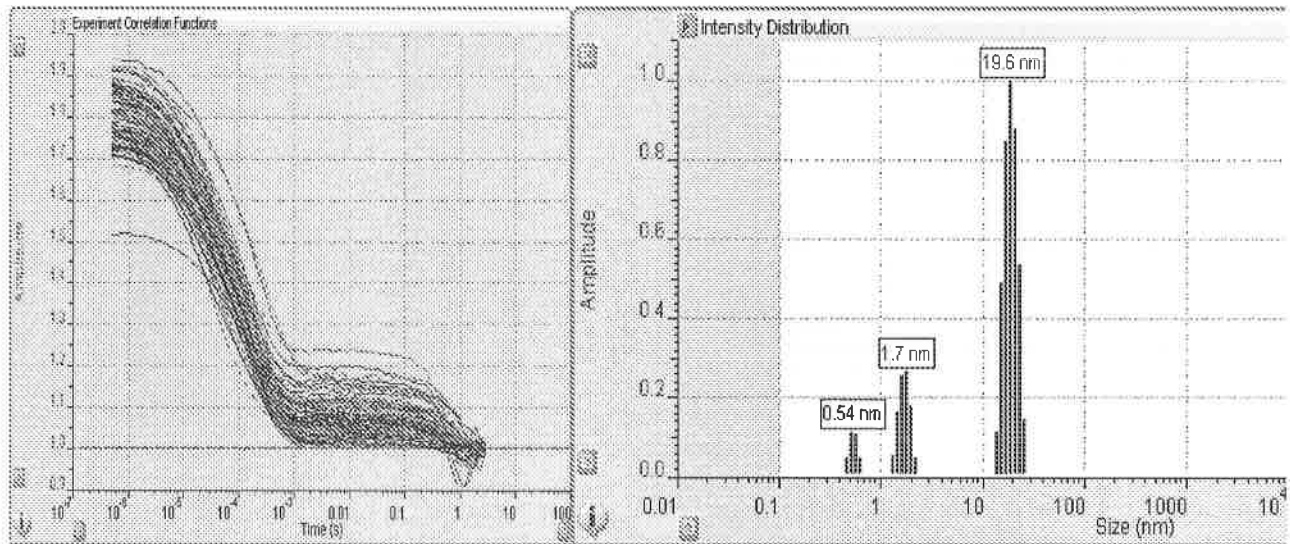


Figure 30c

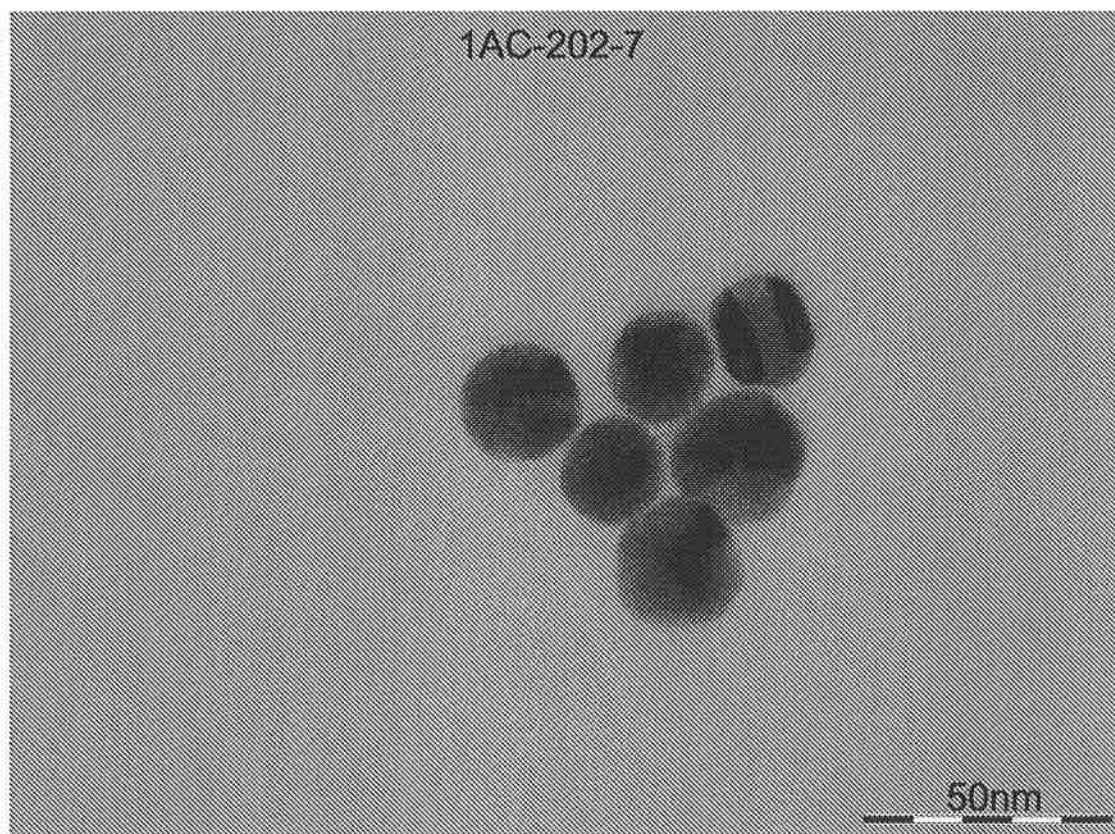


Figure 31a

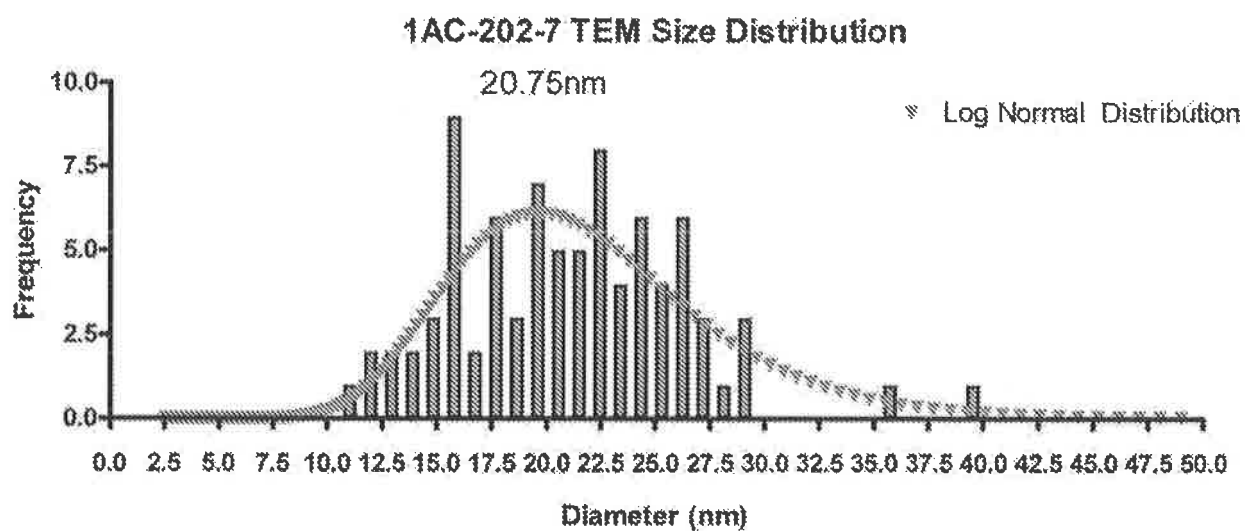


Figure 31b

Gold 1AC-202-7
1.19% transmission

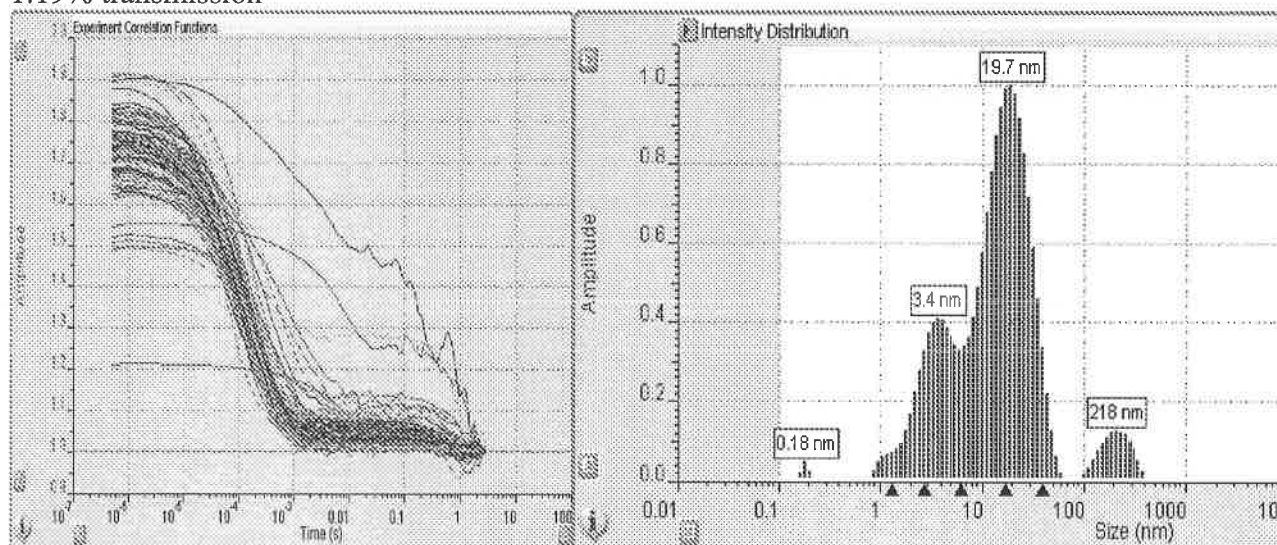


Figure 31c

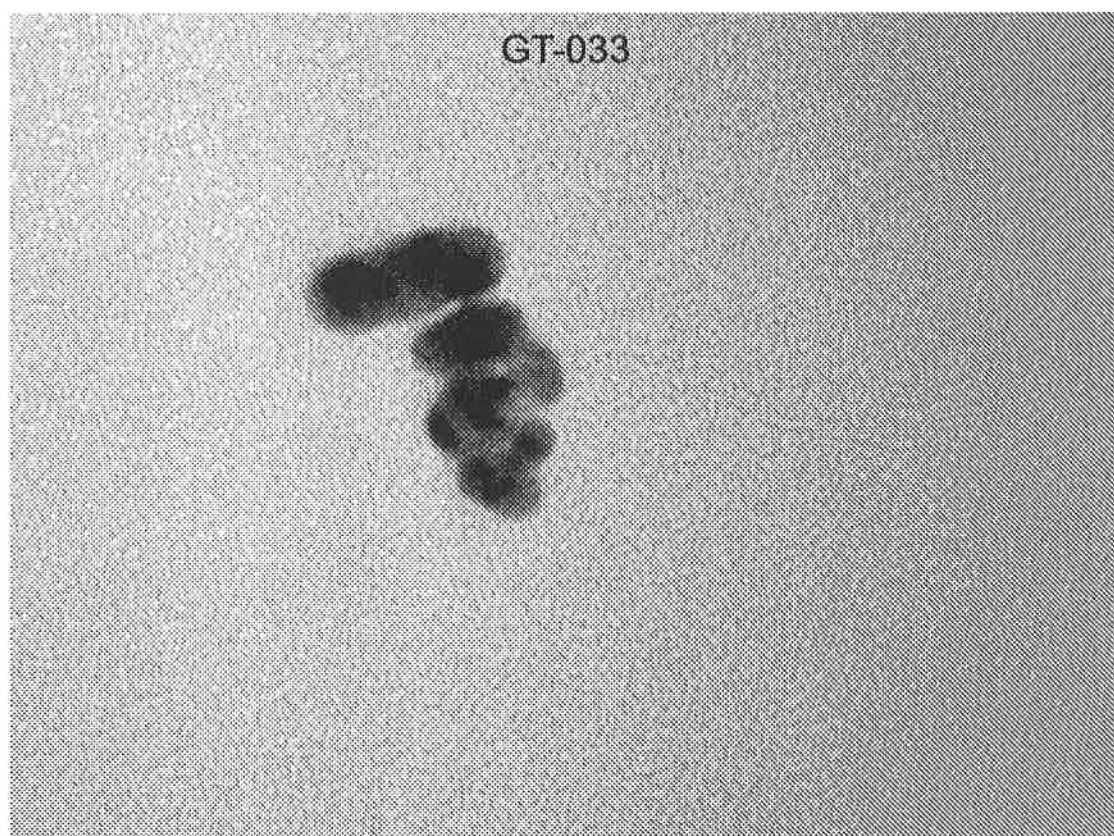


Figure 32a

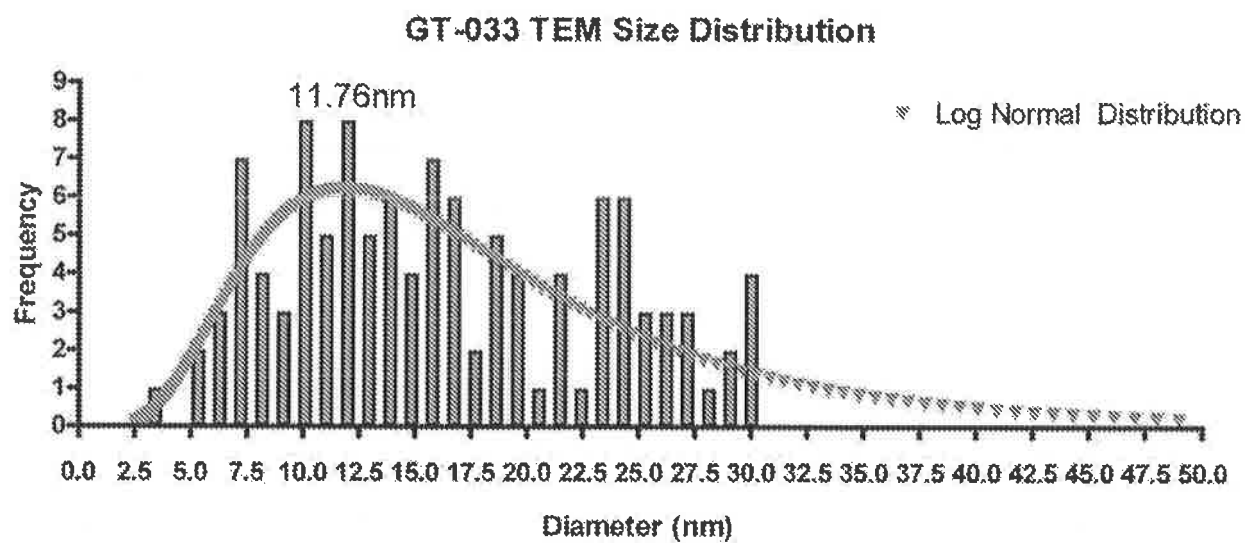


Figure 32b

Au GT-033
16.53% transmission

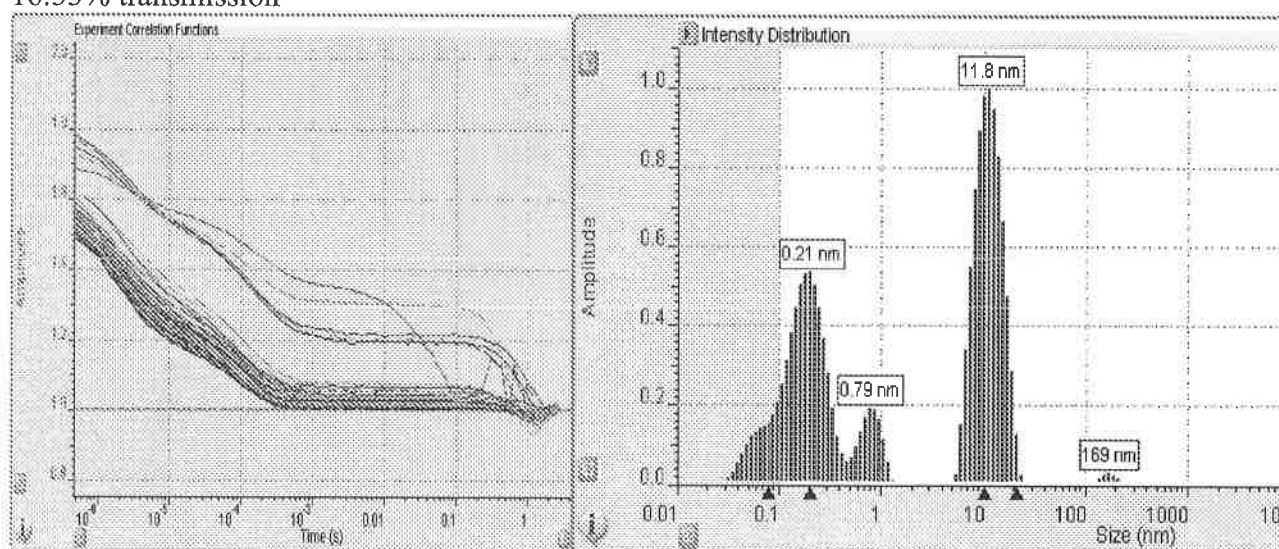


Figure 32c

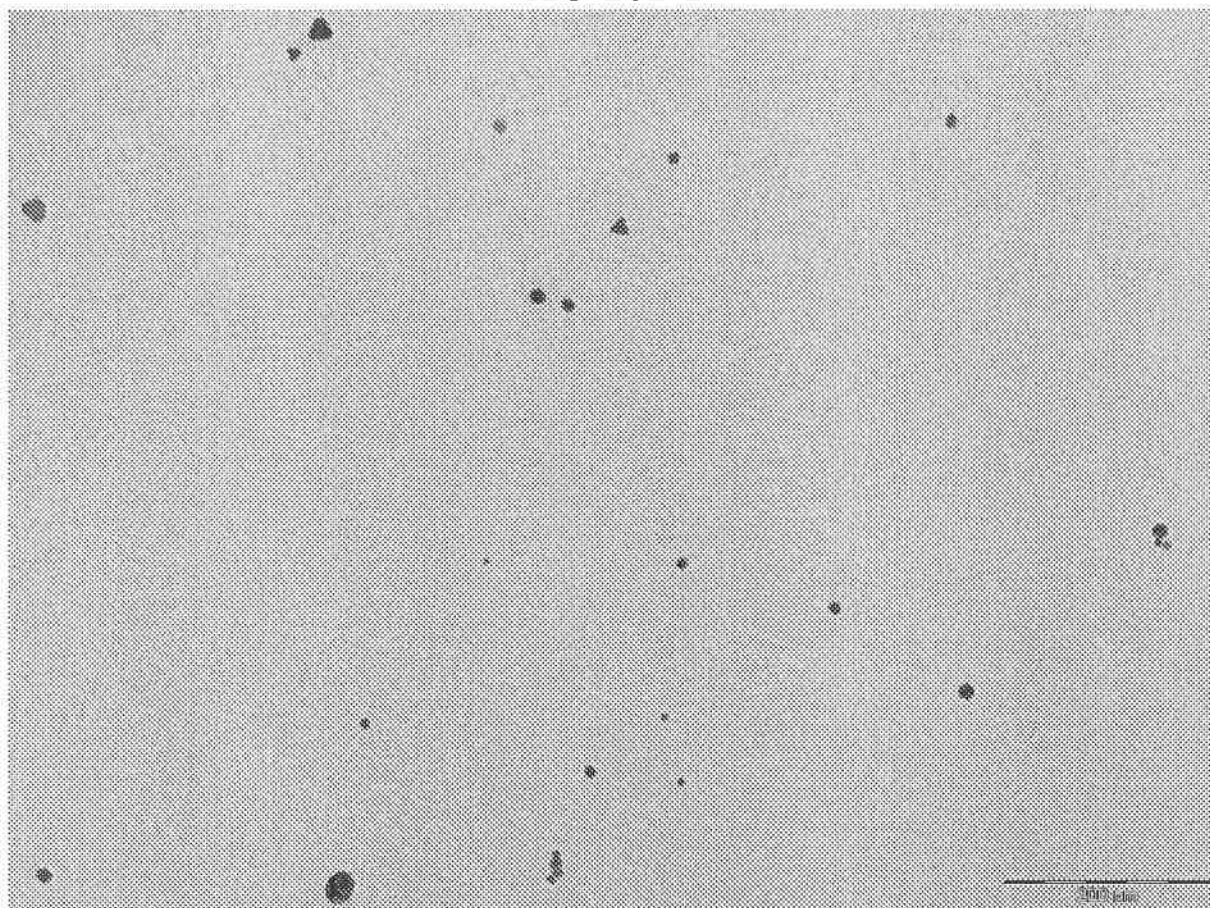
AC-261-1

Figure 33a

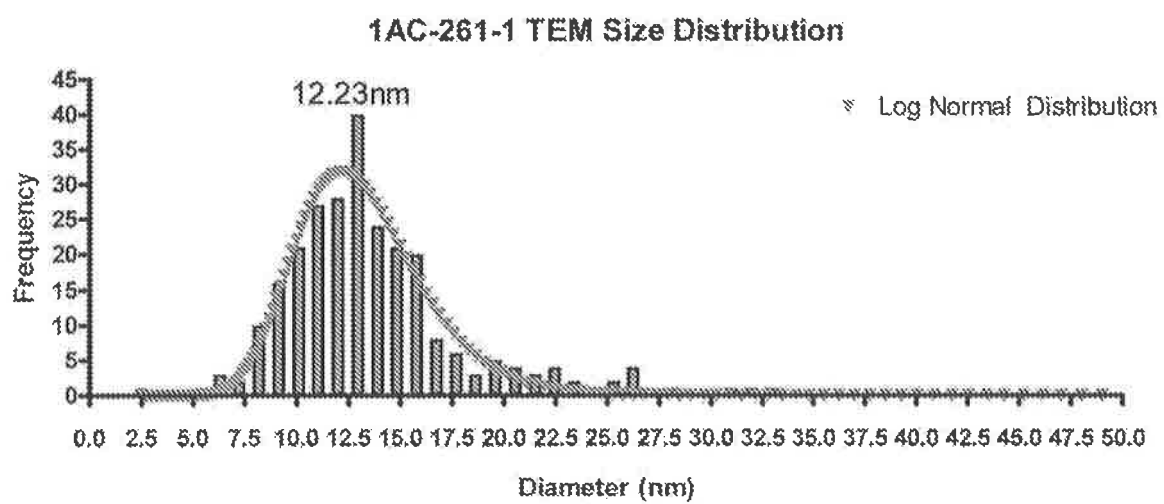


Figure 33b

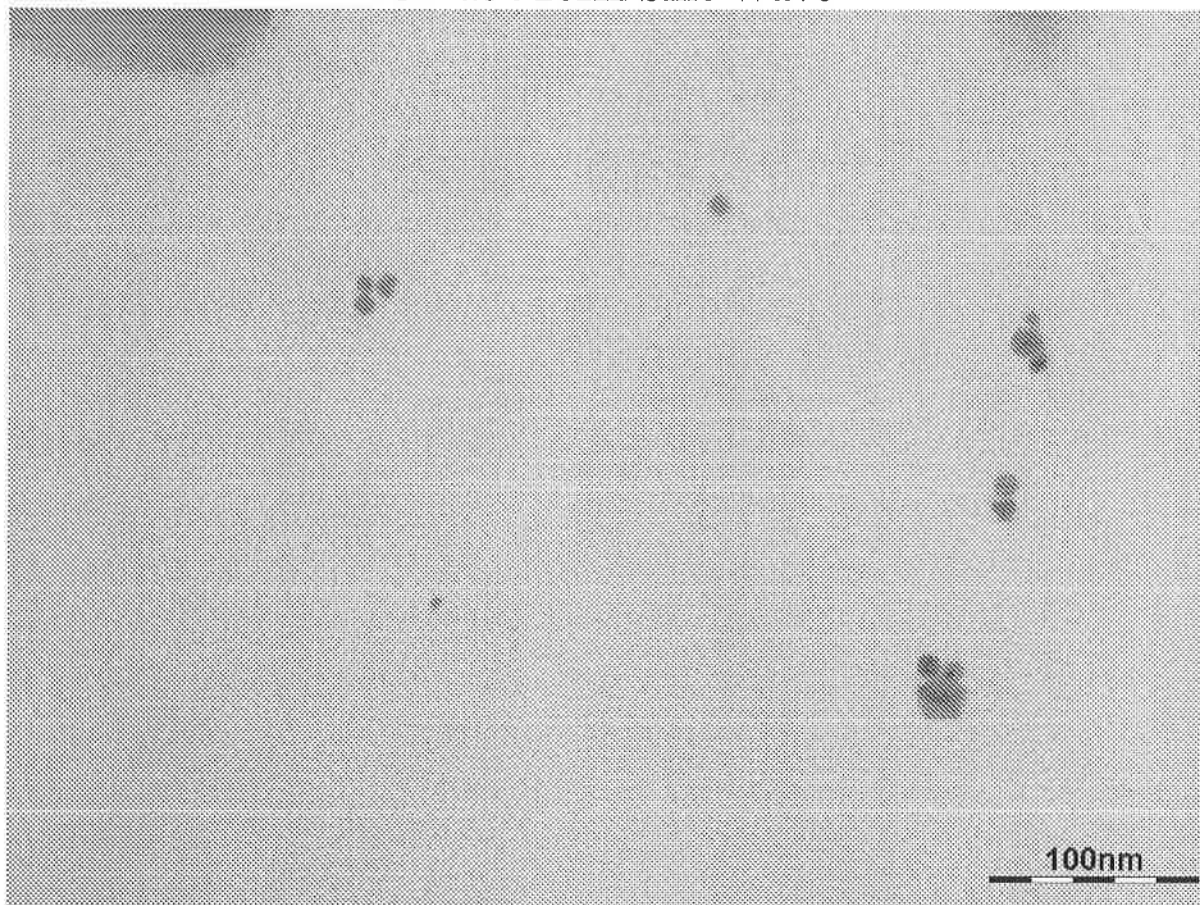
GB-154 20Hz Sine Wave

Figure 34a

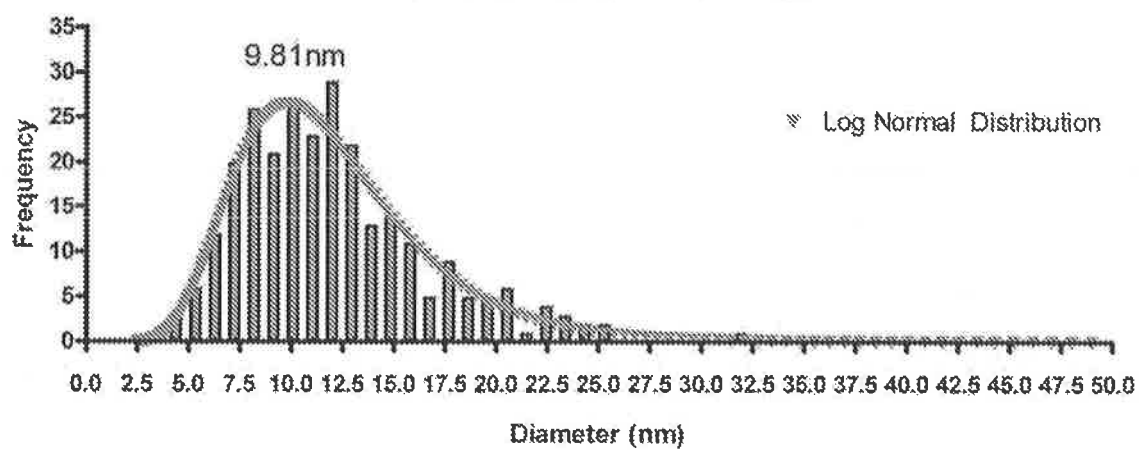
GB-154 TEM Size Distribution

Figure 34b

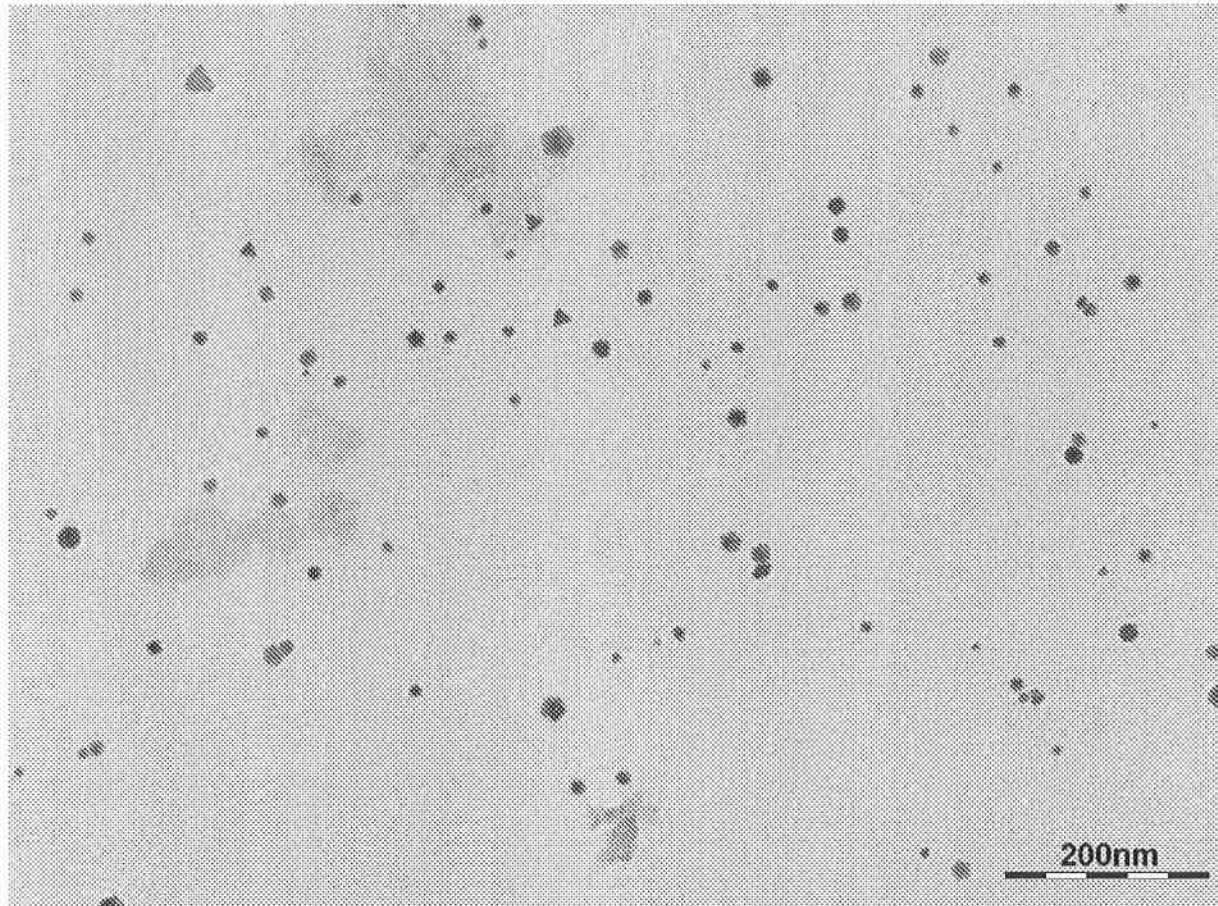
GB-157 40Hz Sine Wave

Figure 35a

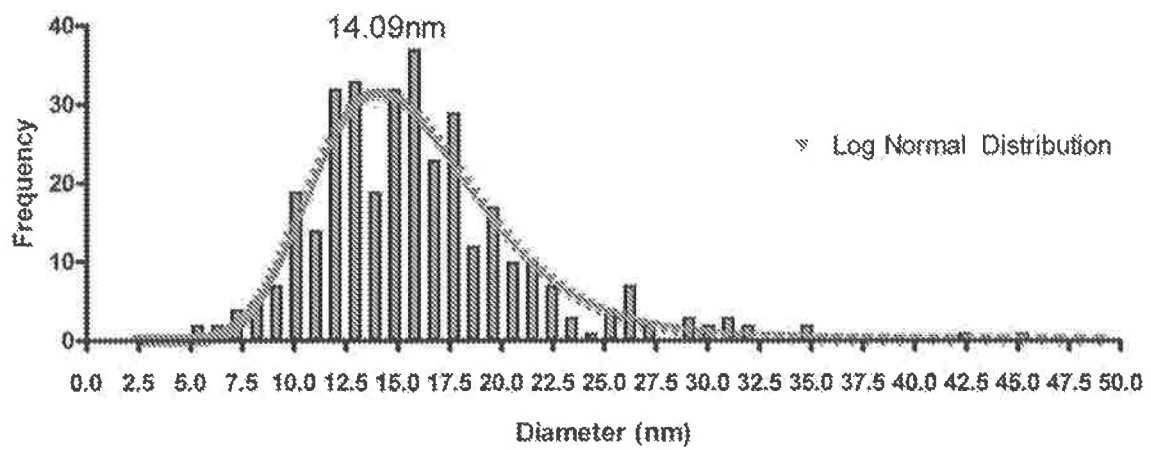
GB-157 TEM Size Distribution

Figure 35b

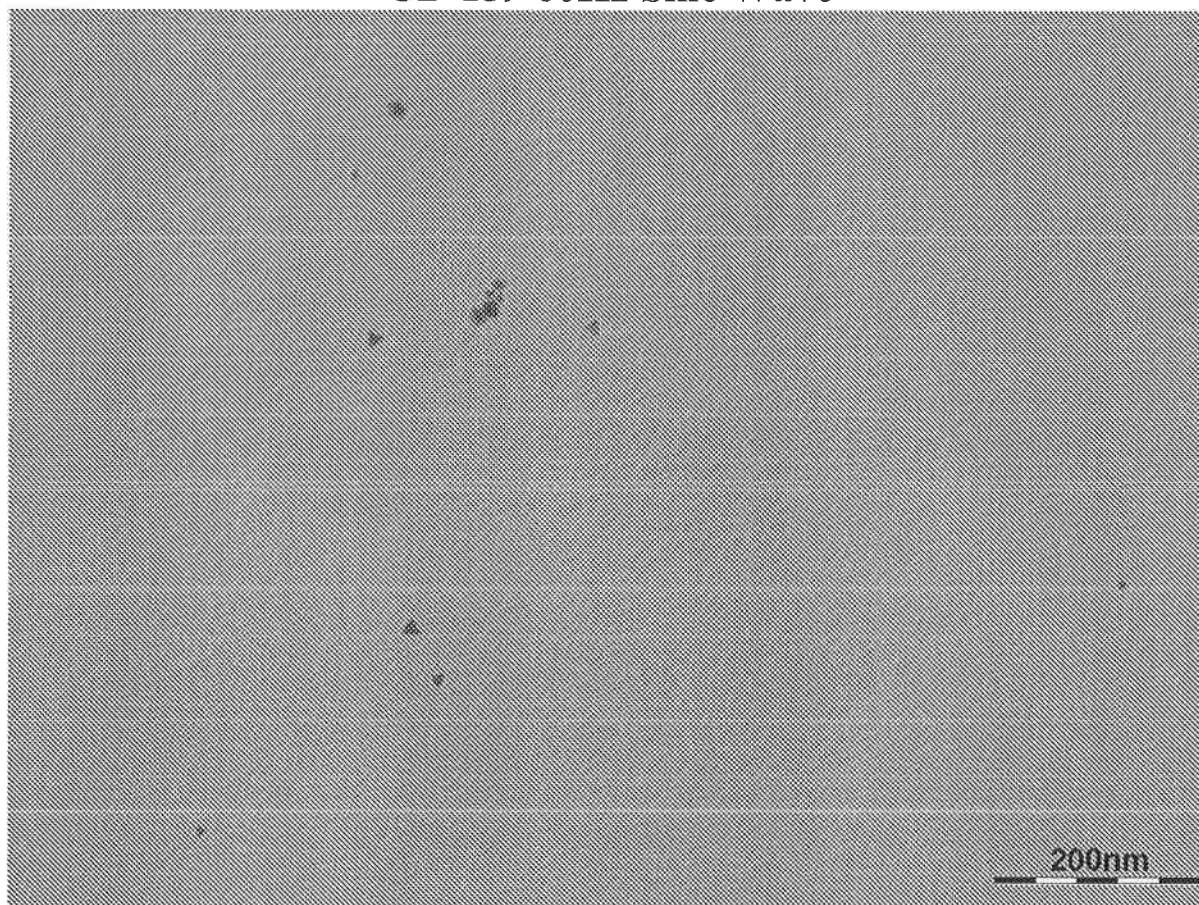
GB-159 60Hz Sine Wave

Figure 36a

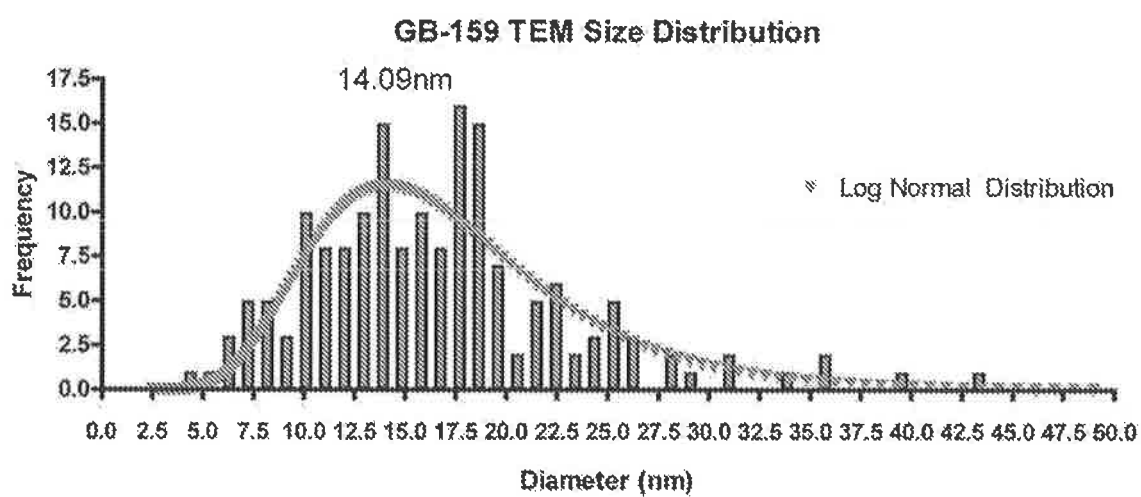


Figure 36b

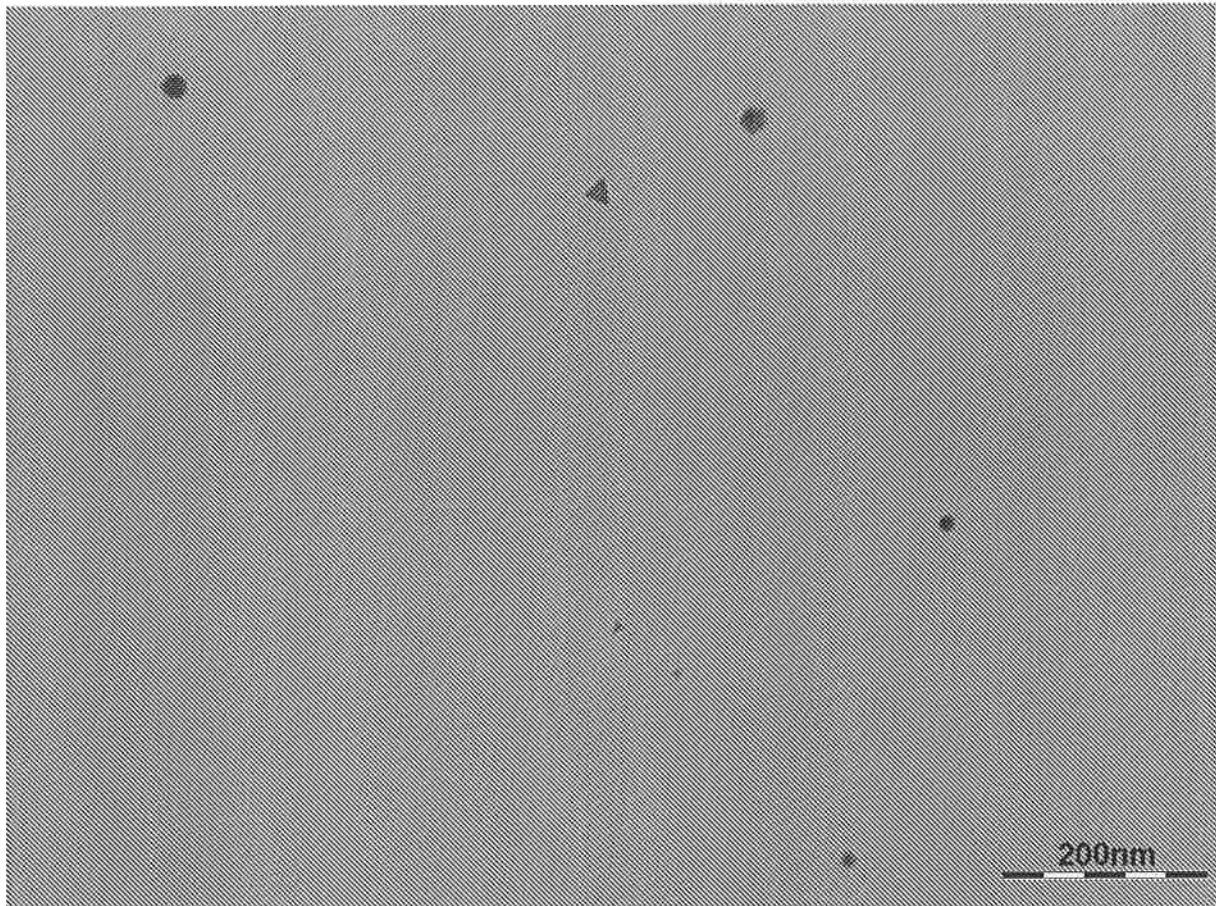
GB-161 80Hz Sine Wave

Figure 37a

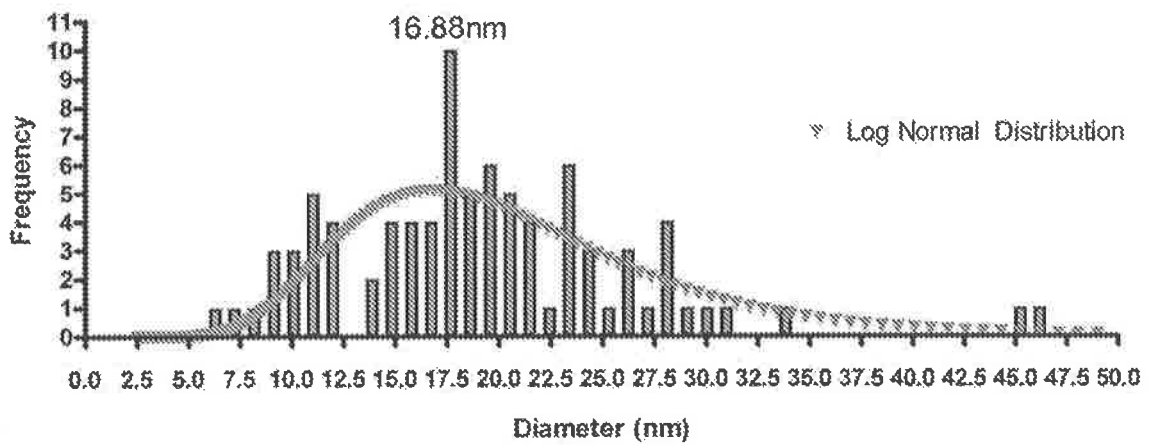
GB-161 TEM Size Distribution

Figure 37b

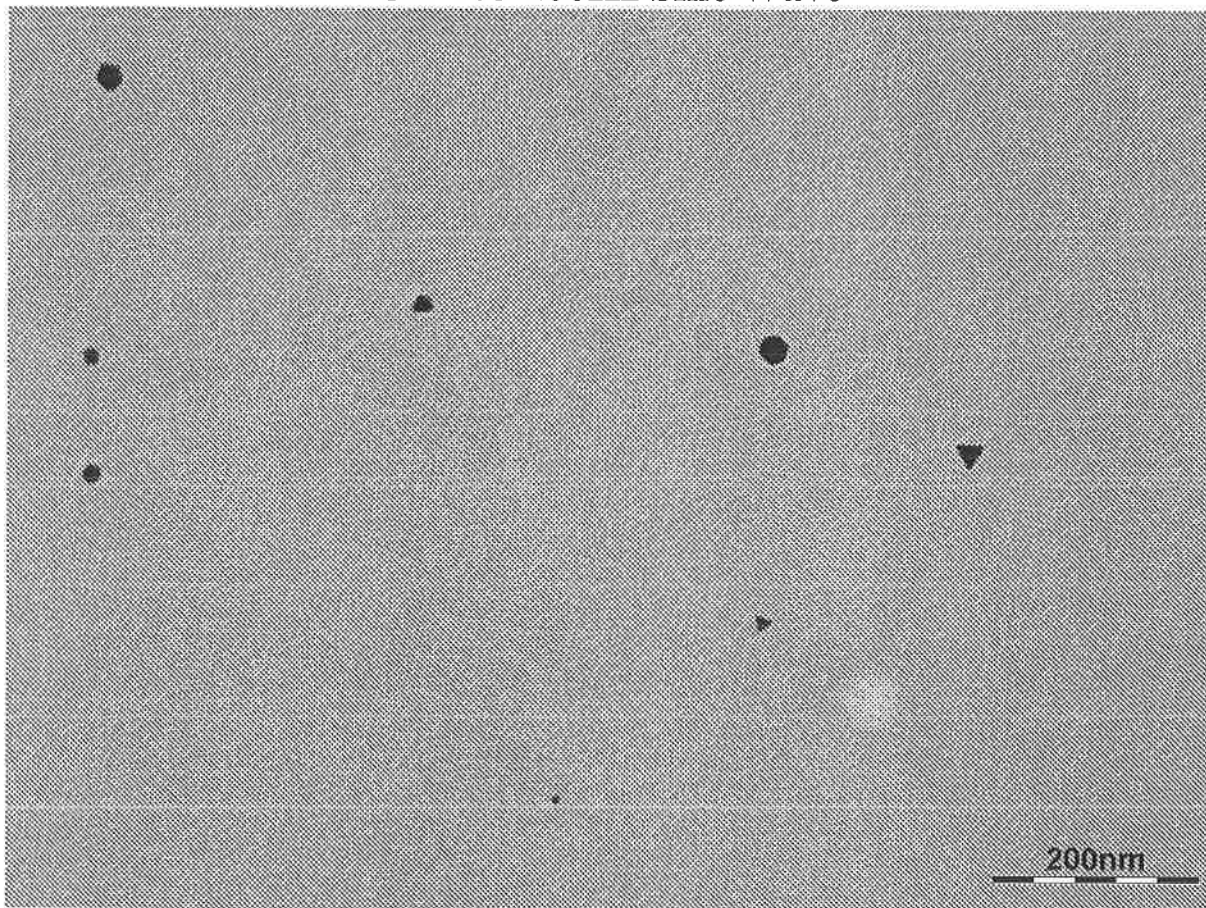
GB-173 100Hz Sine Wave

Figure 38a

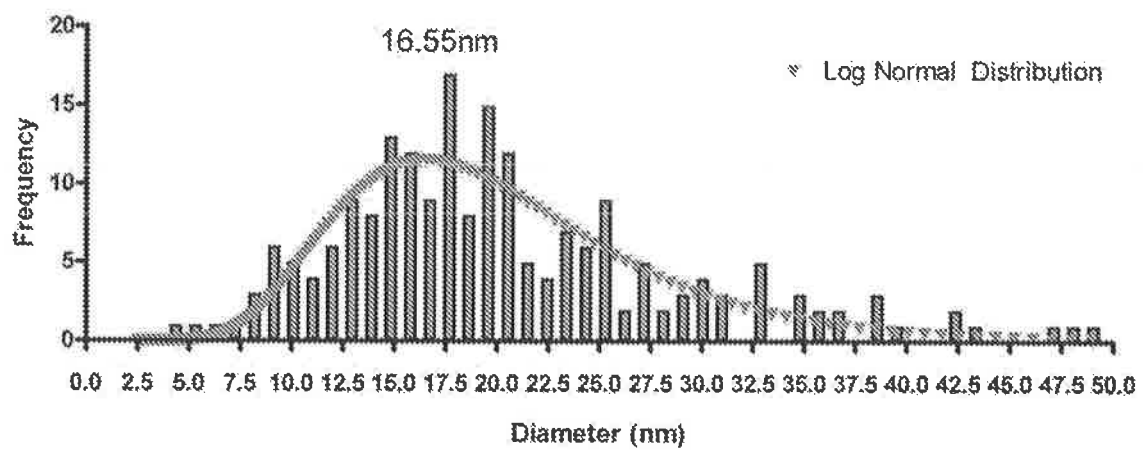
GB-173 TEM Size Distribution

Figure 38b

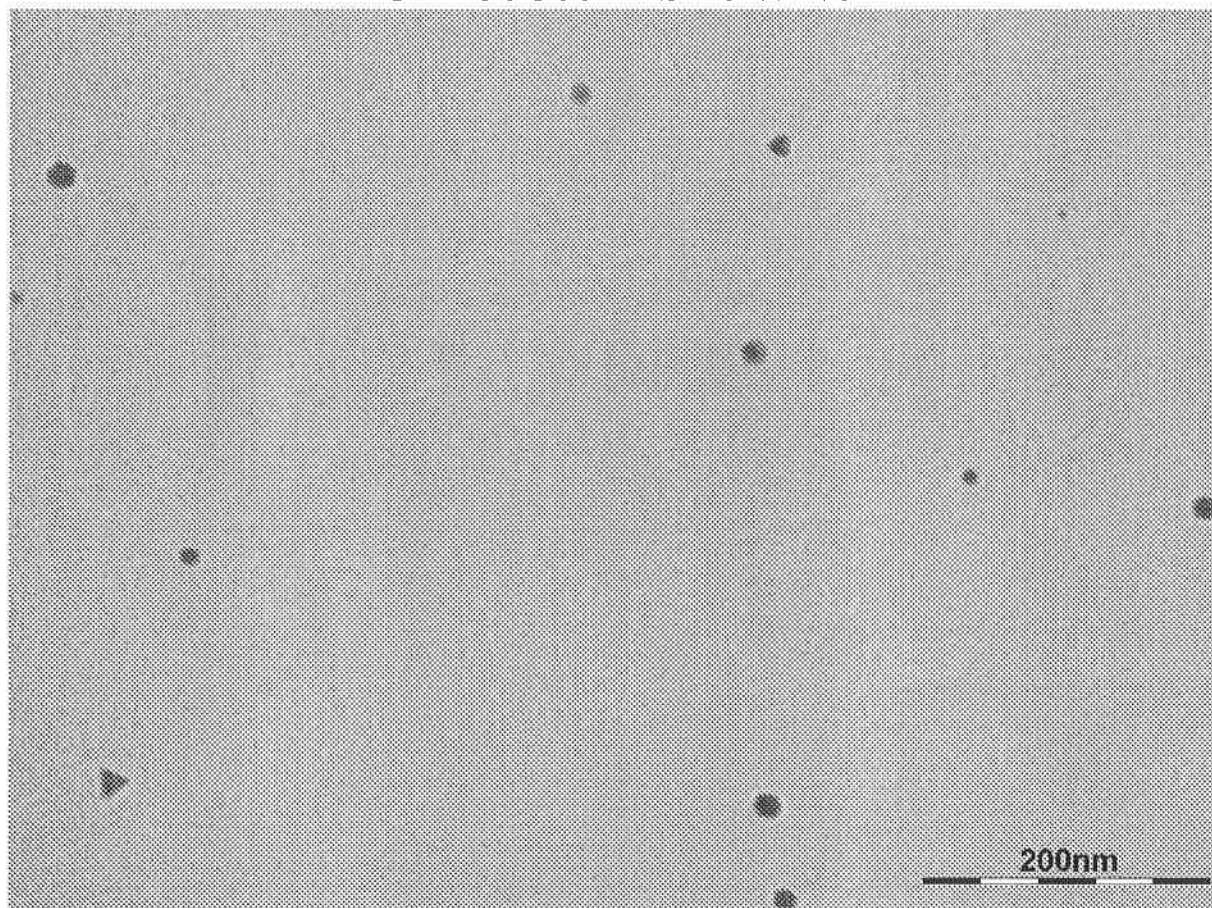
GB-156 300Hz Sine Wave

Figure 39a

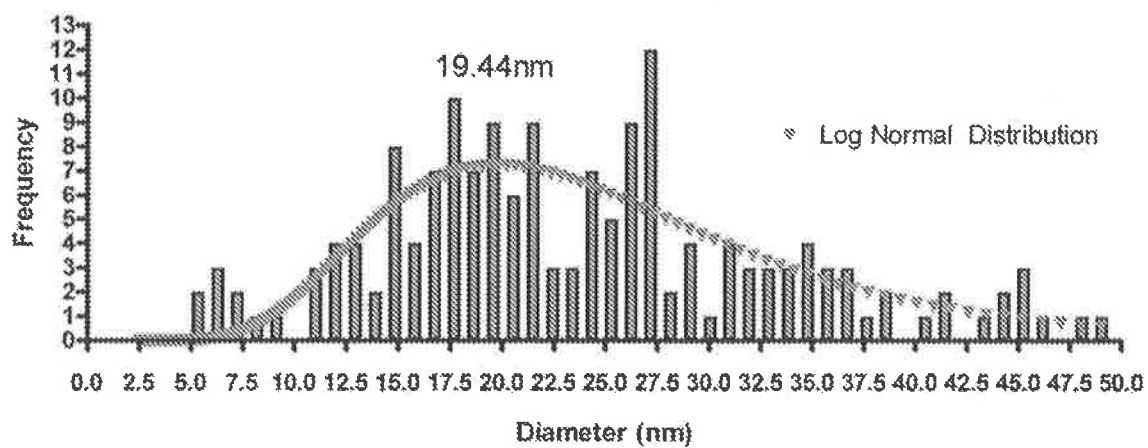
GB-156 TEM Size Distribution

Figure 39b

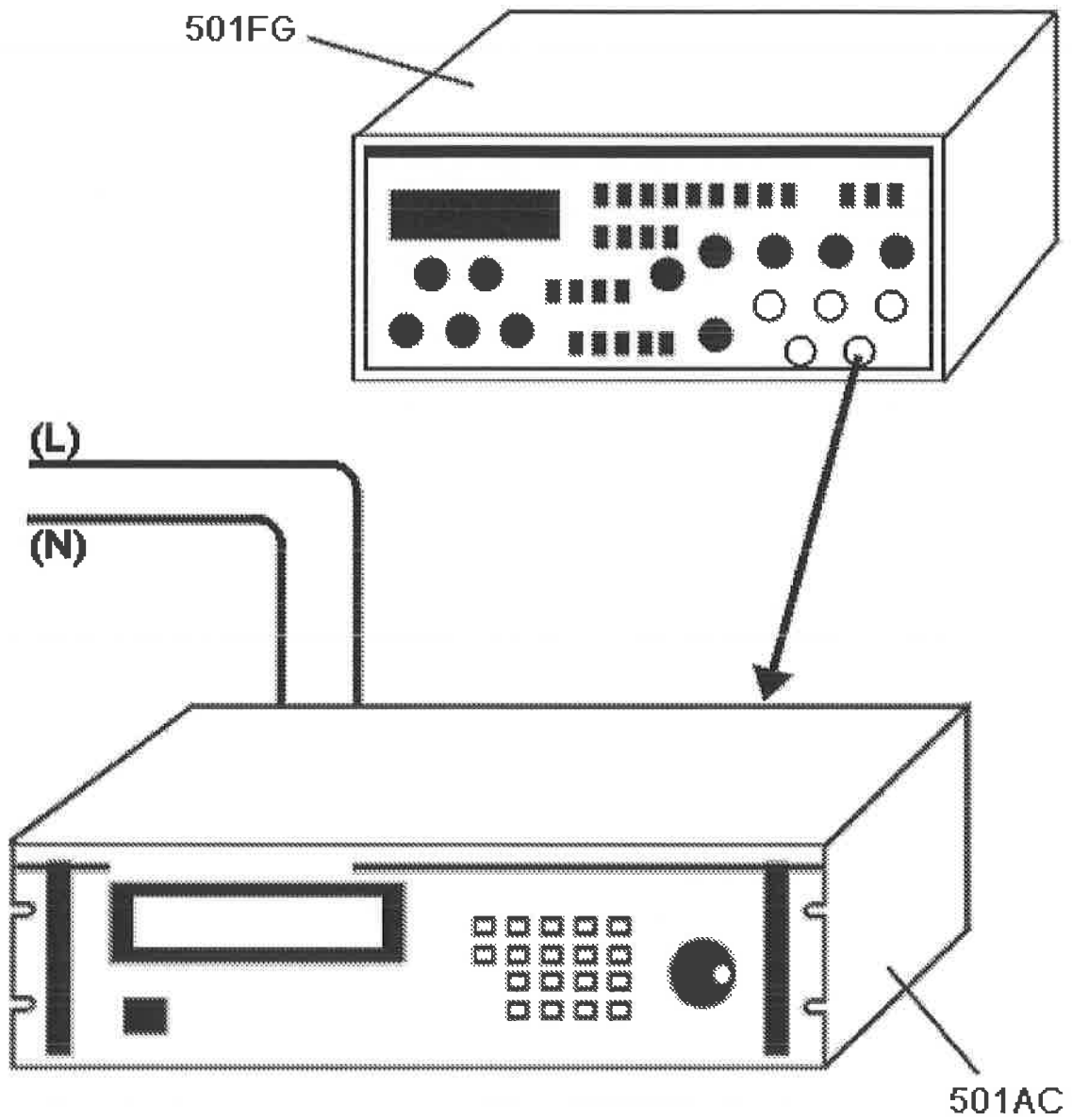


Figure 40

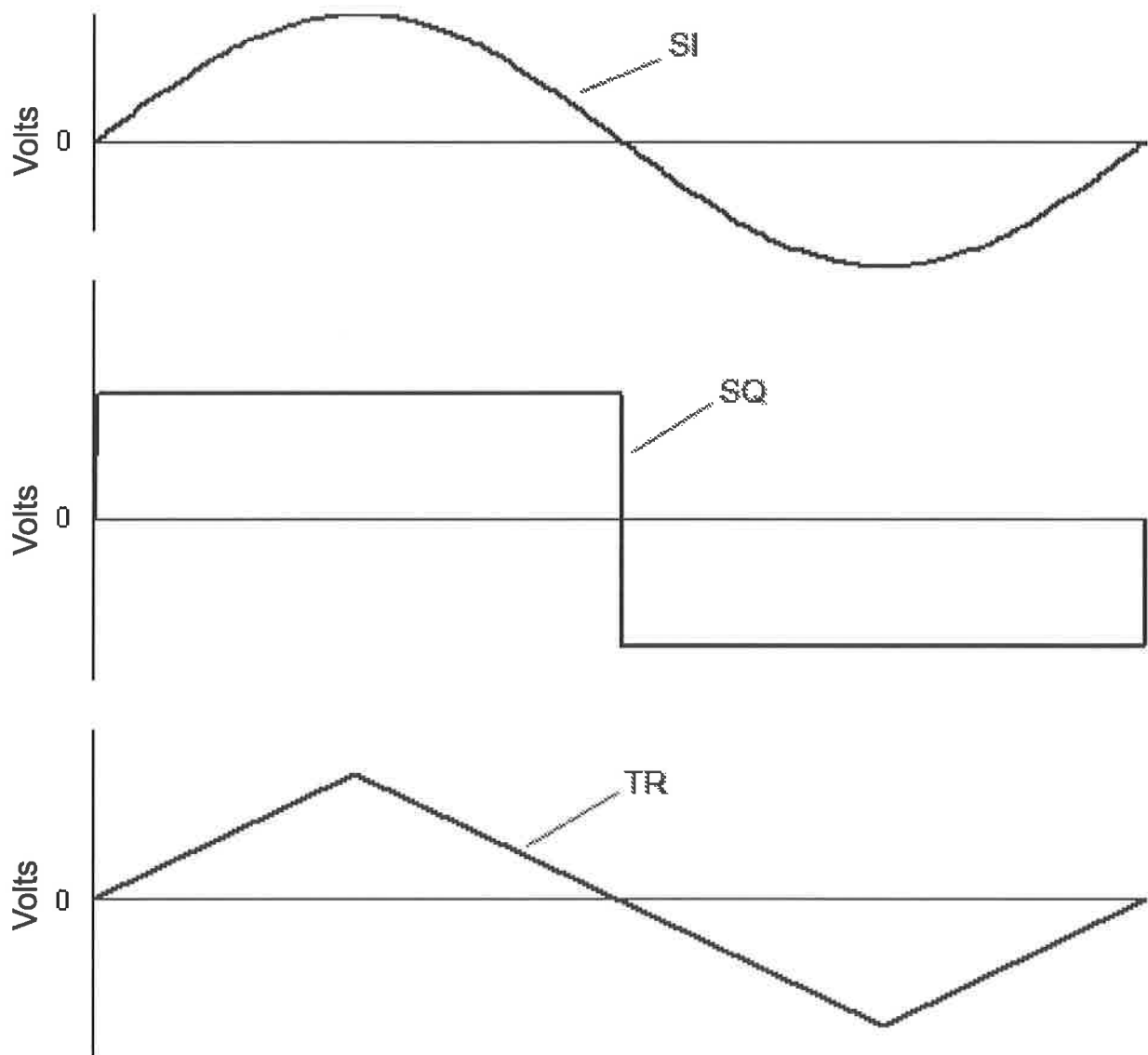


Figure 41

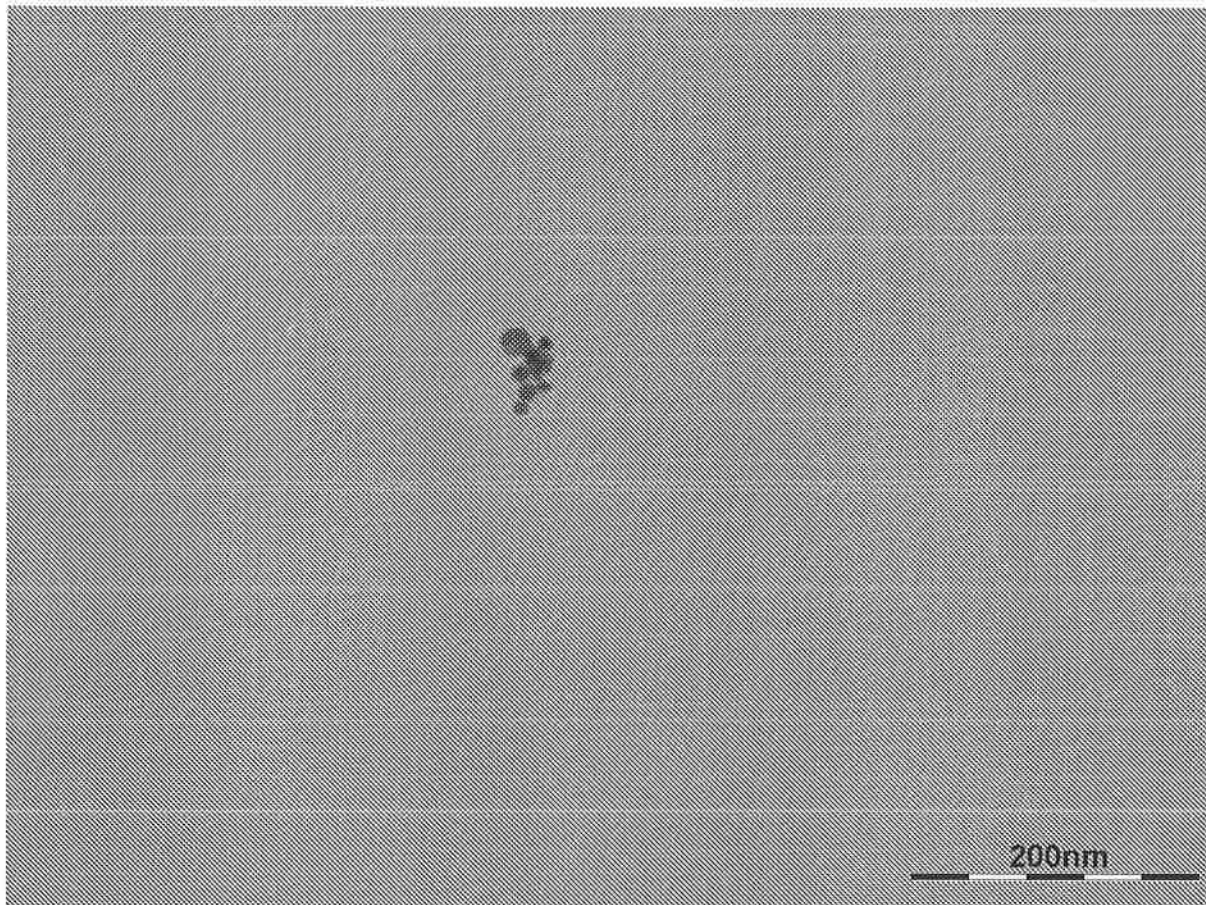
GB-166 60Hz Sine Wave

Figure 42a

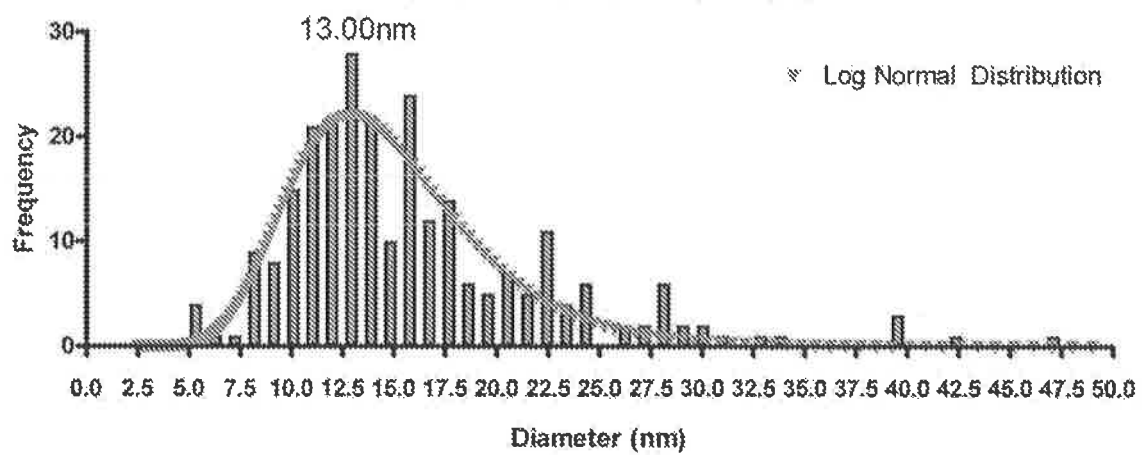
GB-166 TEM Size Distribution

Figure 42b

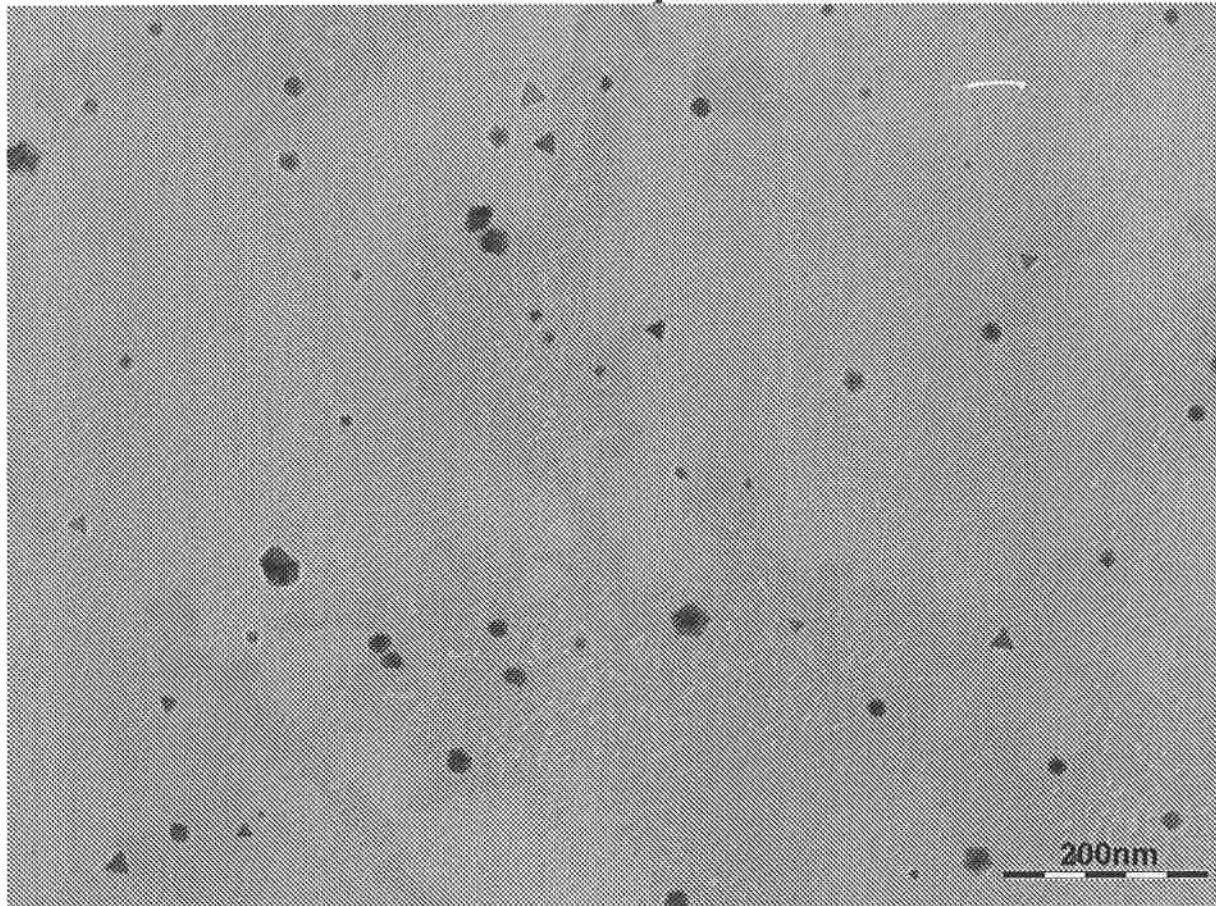
GB-165 60Hz Square Wave

Figure 43a

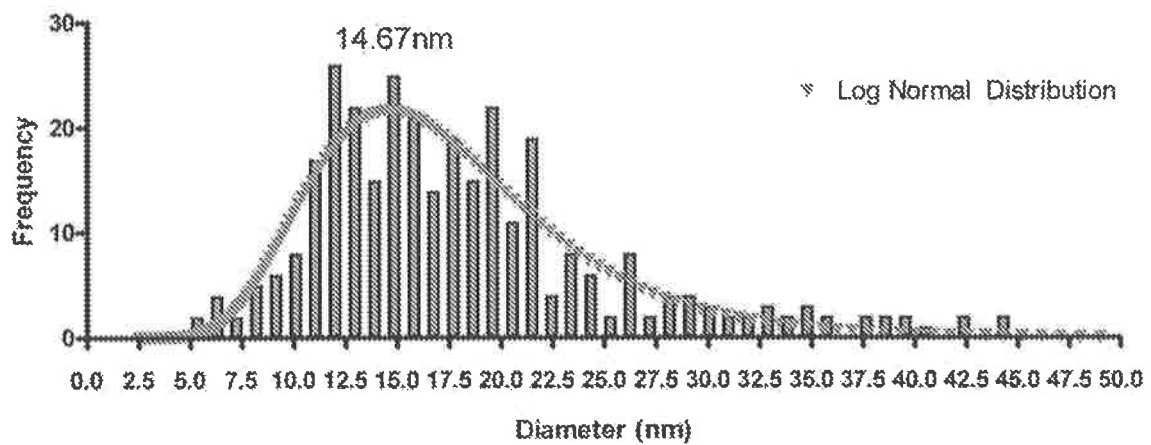
GB-165 TEM Size Distribution

Figure 43b

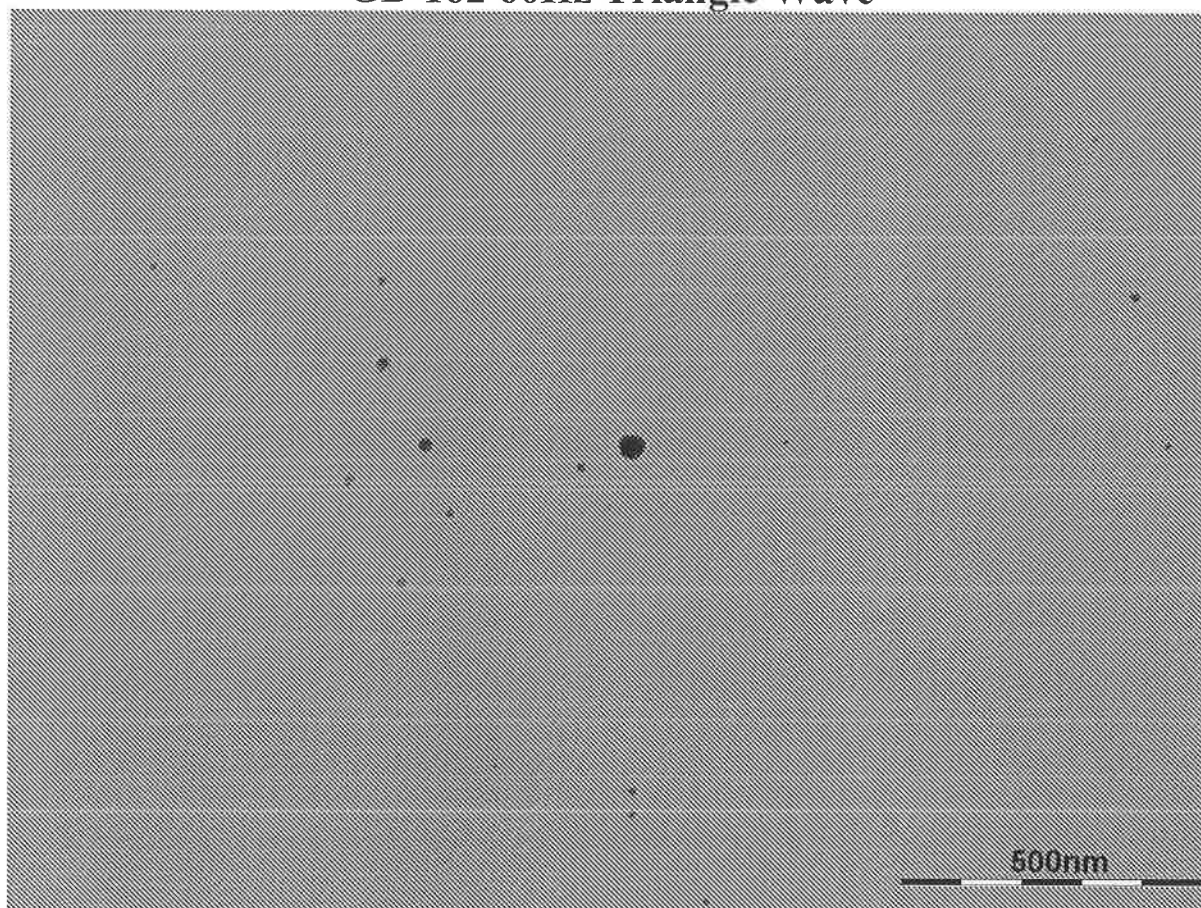
GB-162 60Hz Triangle Wave

Figure 44a

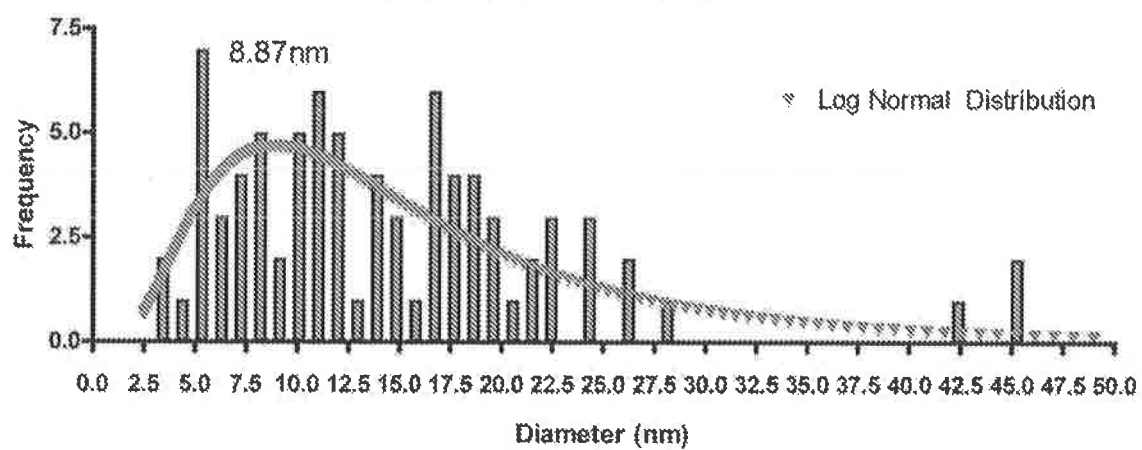
GB-162 TEM Size Distribution

Figure 44b

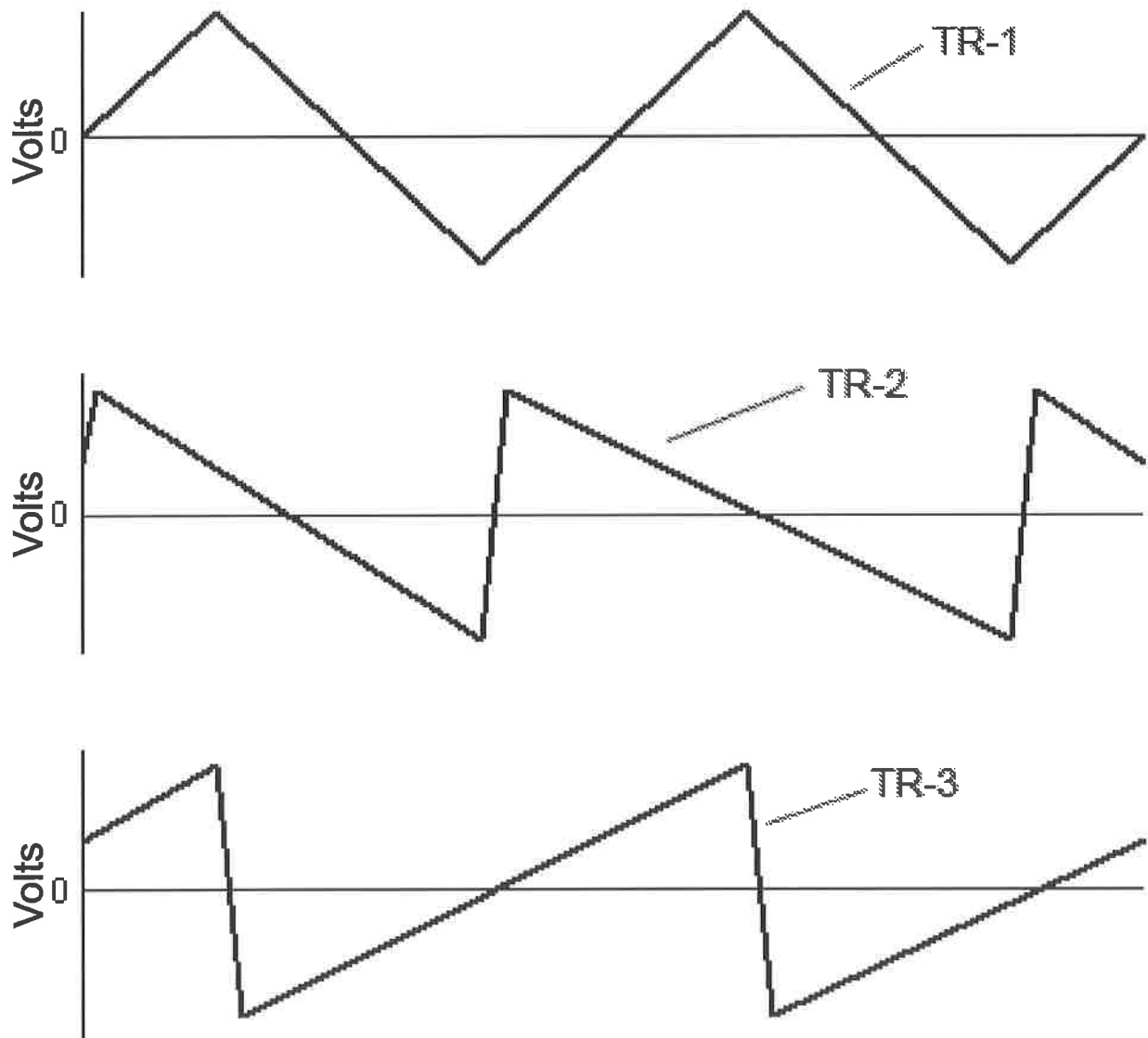


Figure 45

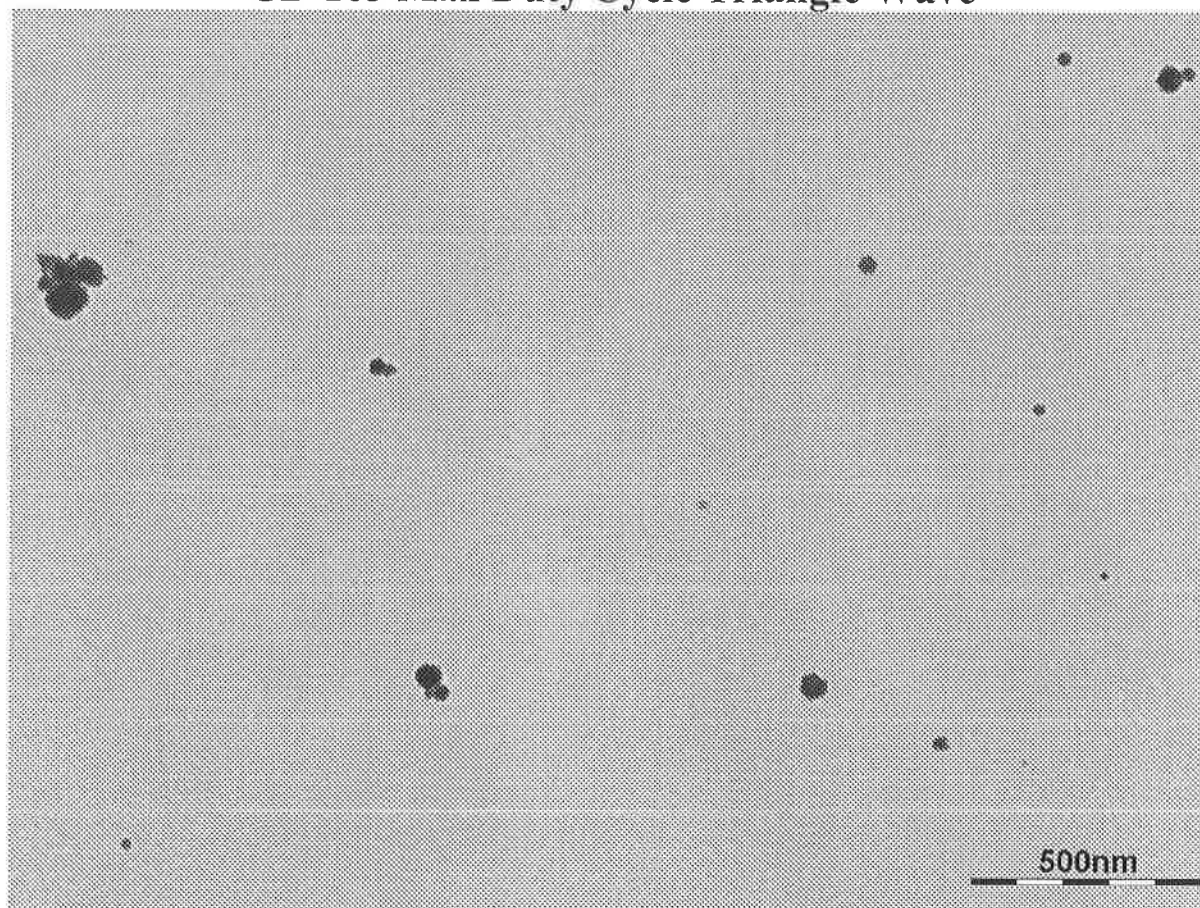
GB-163 Max Duty Cycle Triangle Wave

Figure 46a

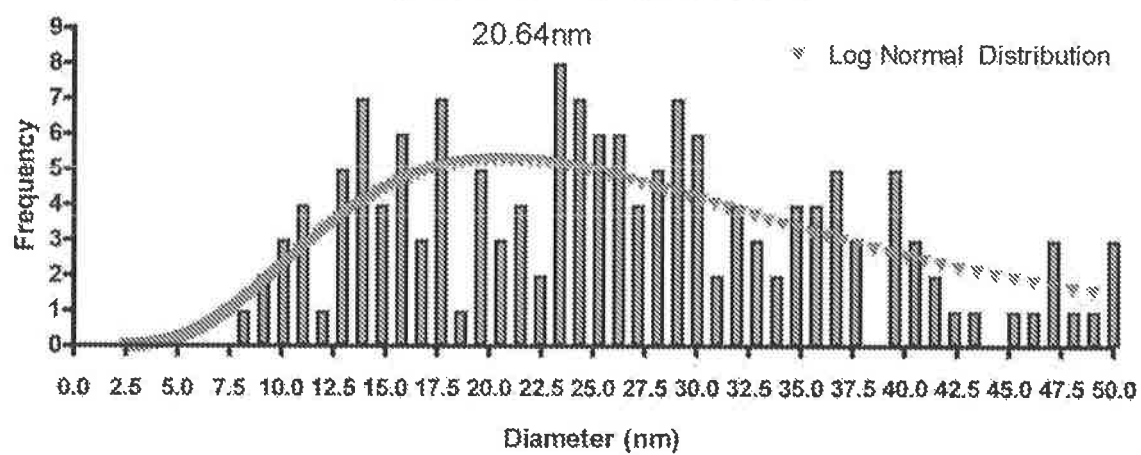
GB-163 TEM Size Distribution

Figure 46b

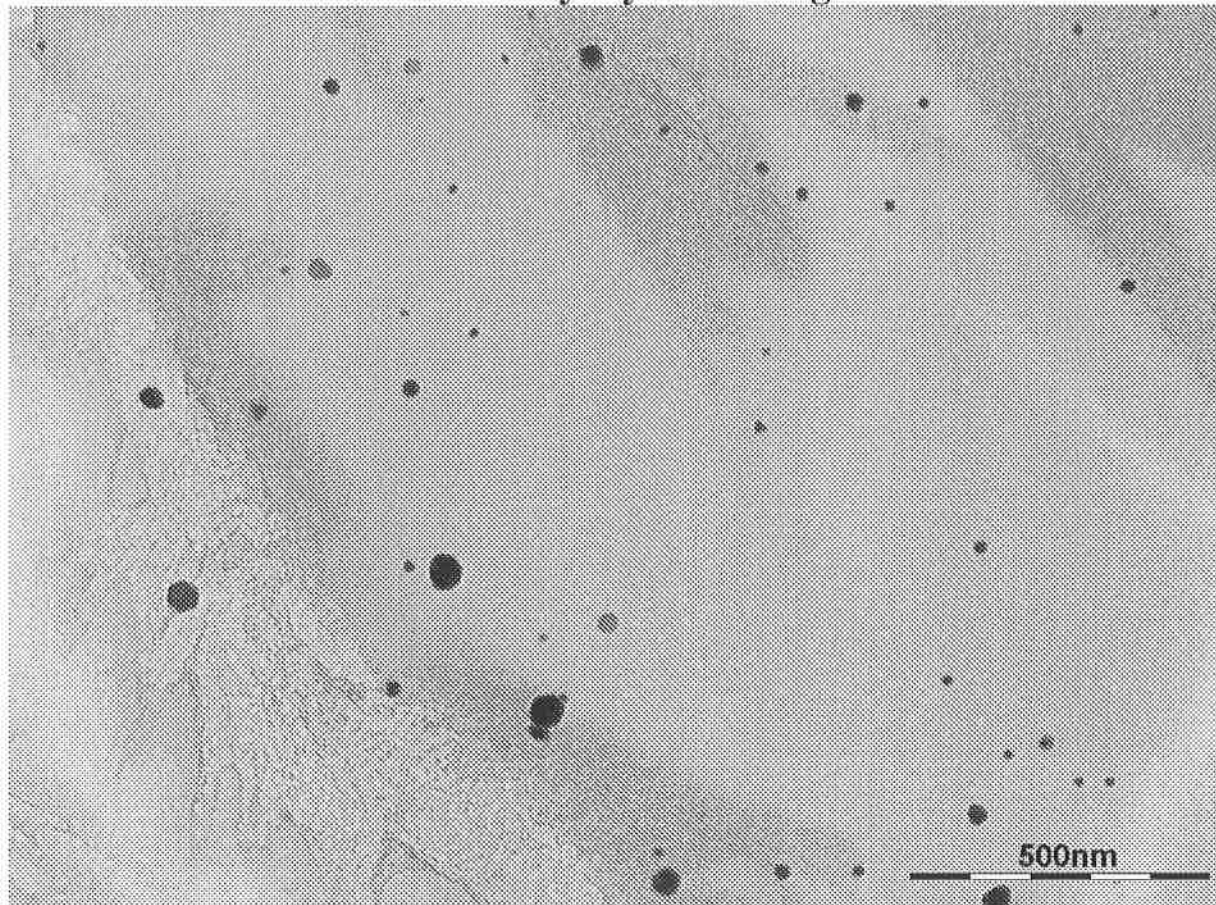
GB-164 Min Duty Cycle Triangle Wave

Figure 47a

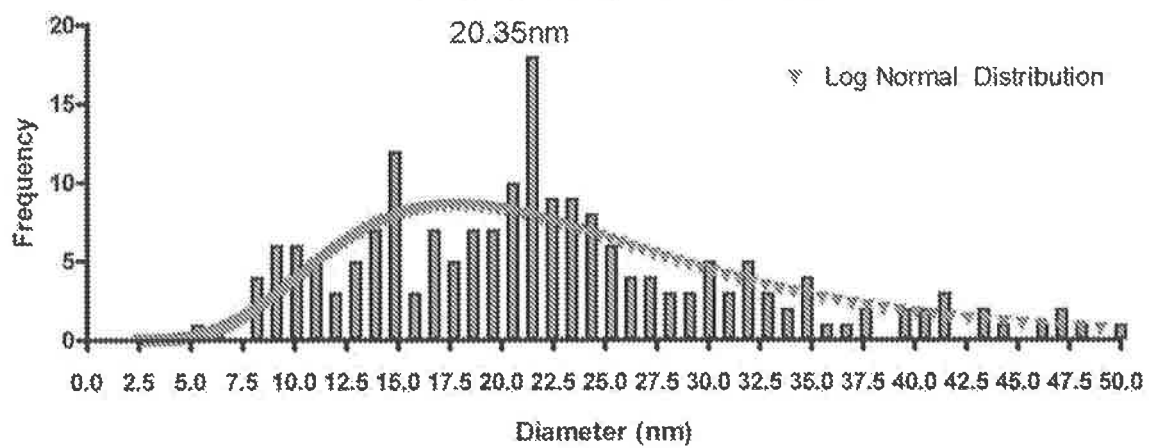
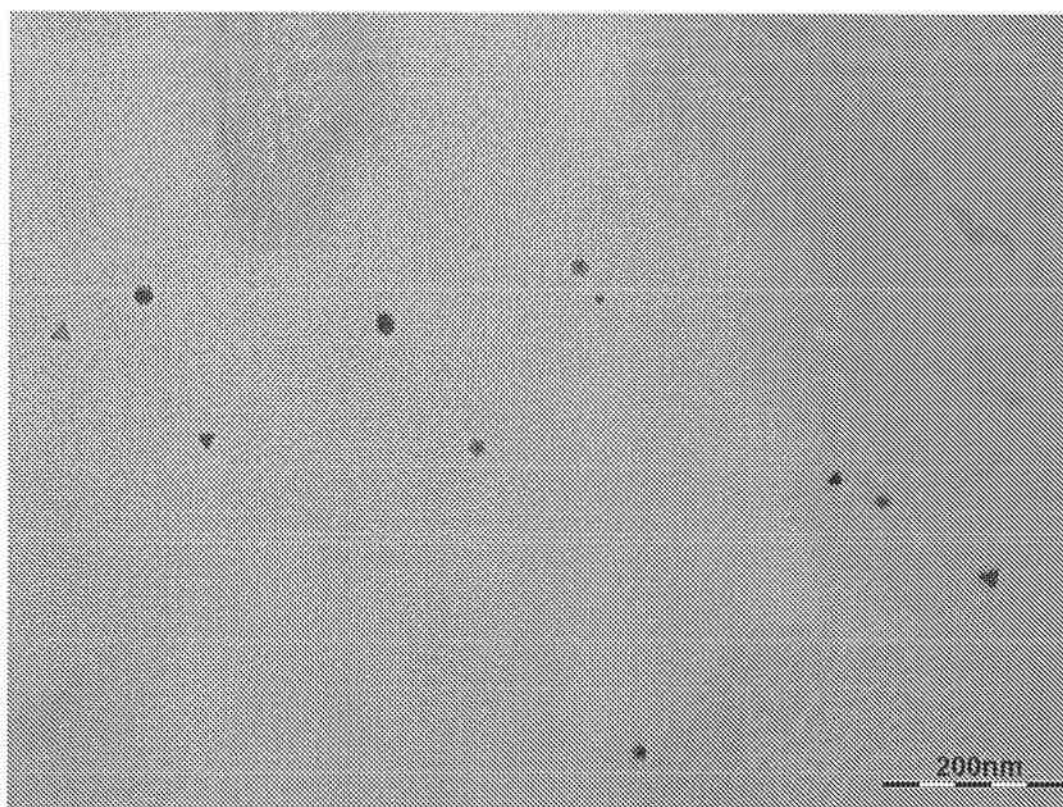
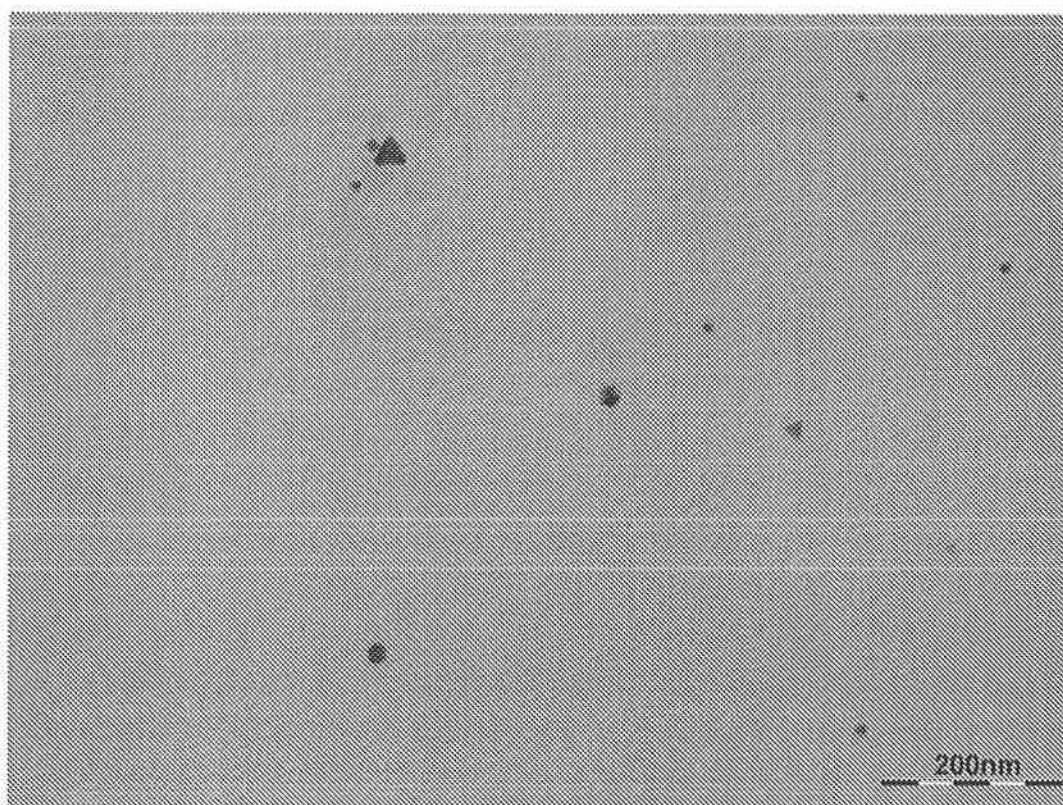
GB-164 TEM Size Distribution

Figure 47b



a1



a2

Figure 48
GB-134

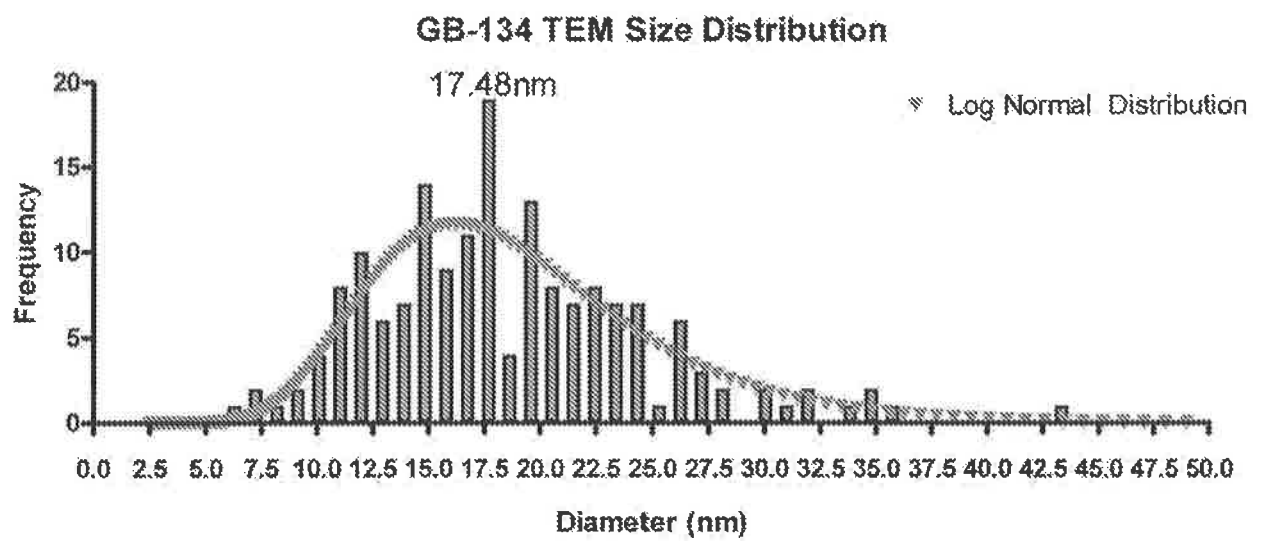


Figure 48b

Gold GB-134
4.07% transmission

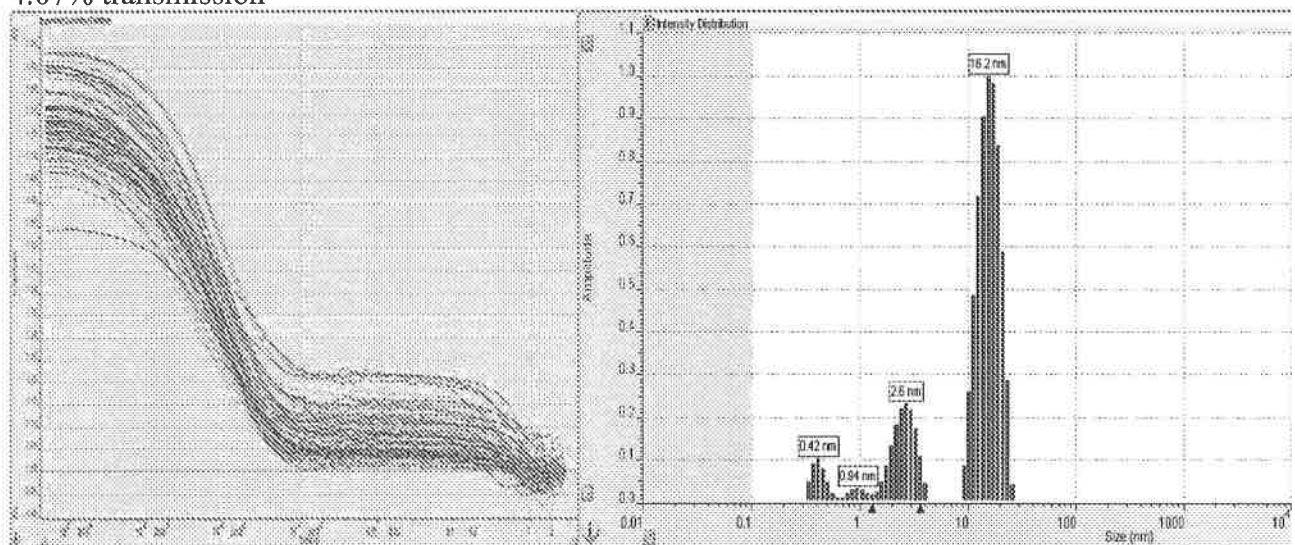
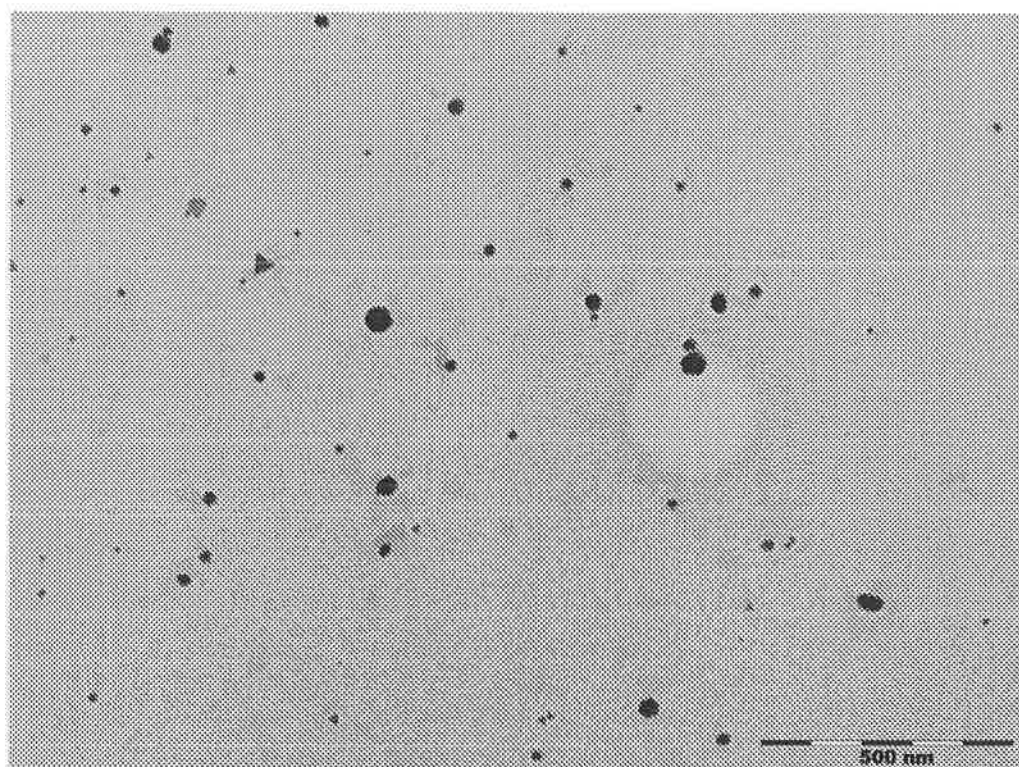
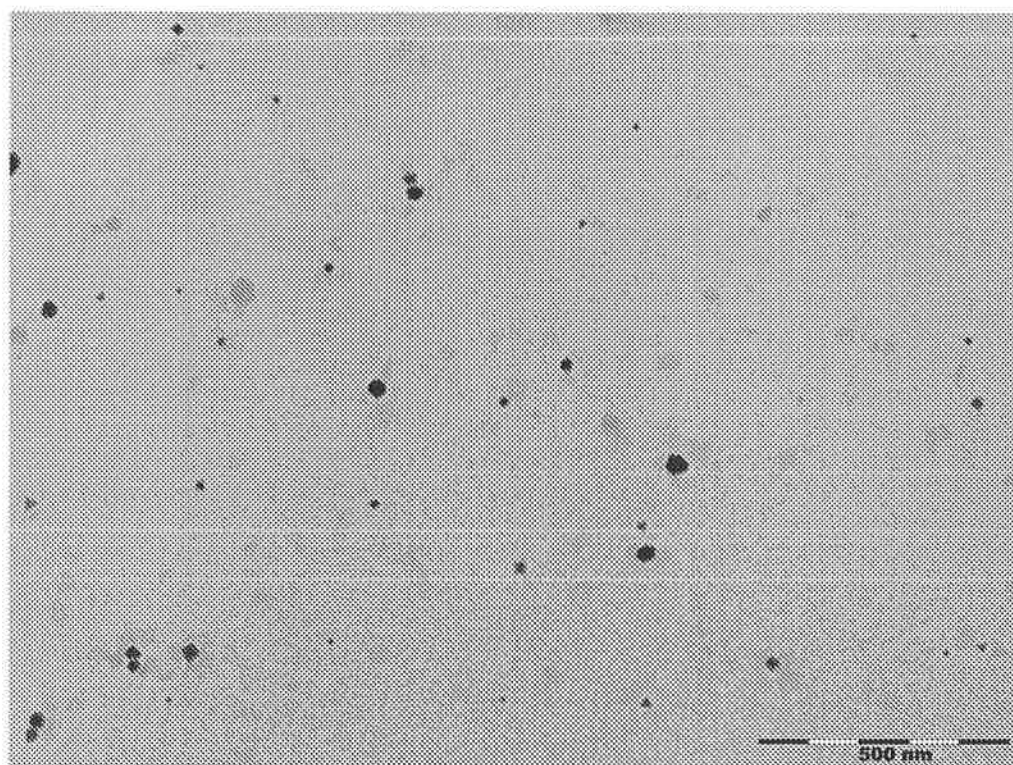


Figure 48c



a1



a2

Figure 49
GB-098

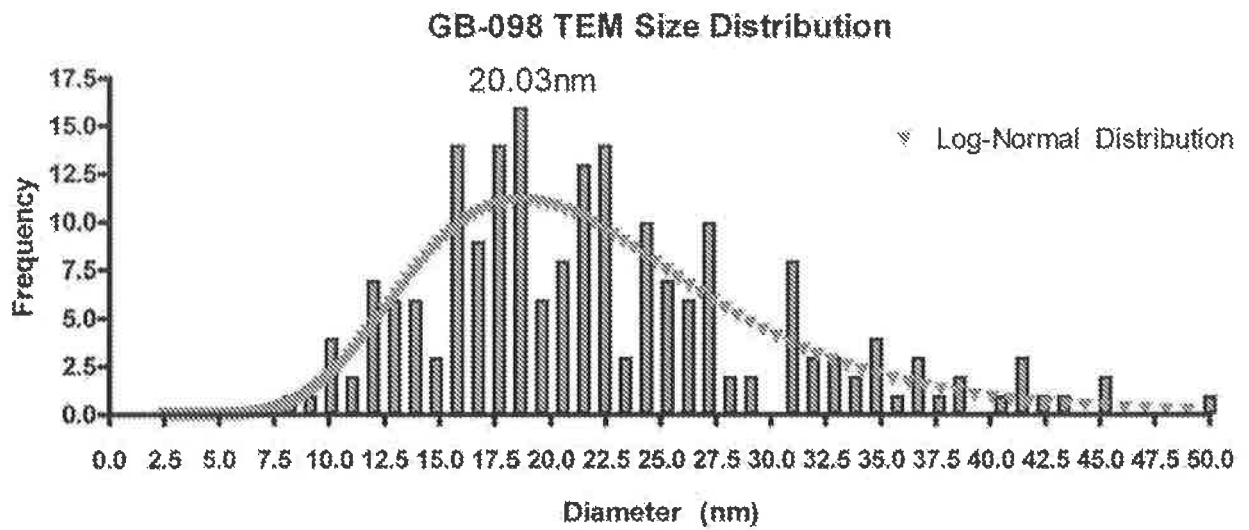


Figure 49b

Gold GB-098
1.69% transmission

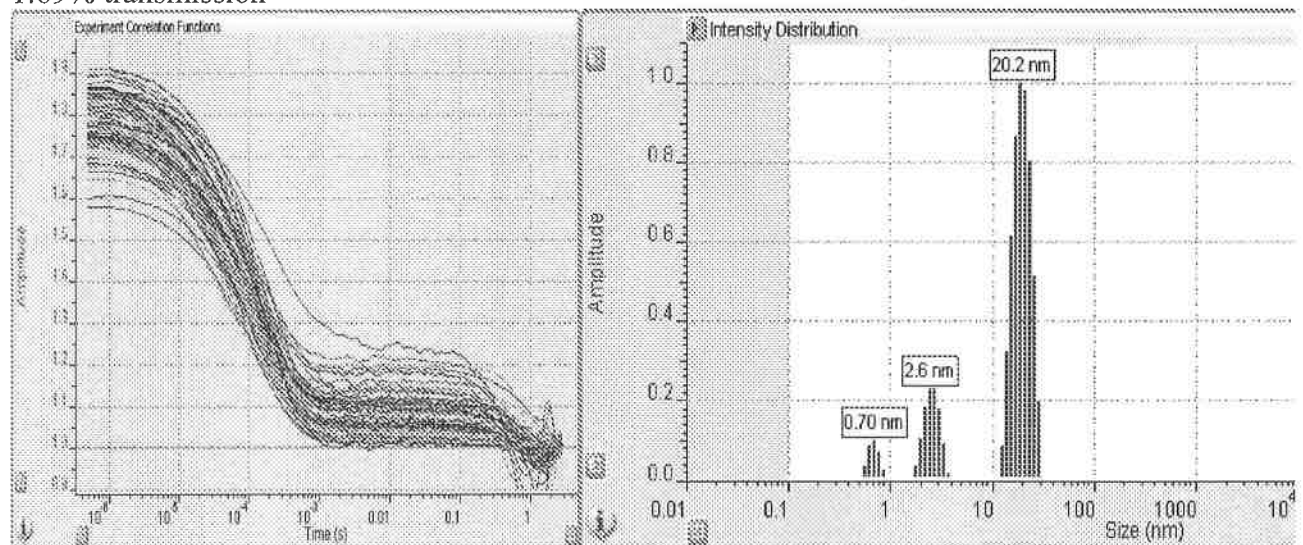
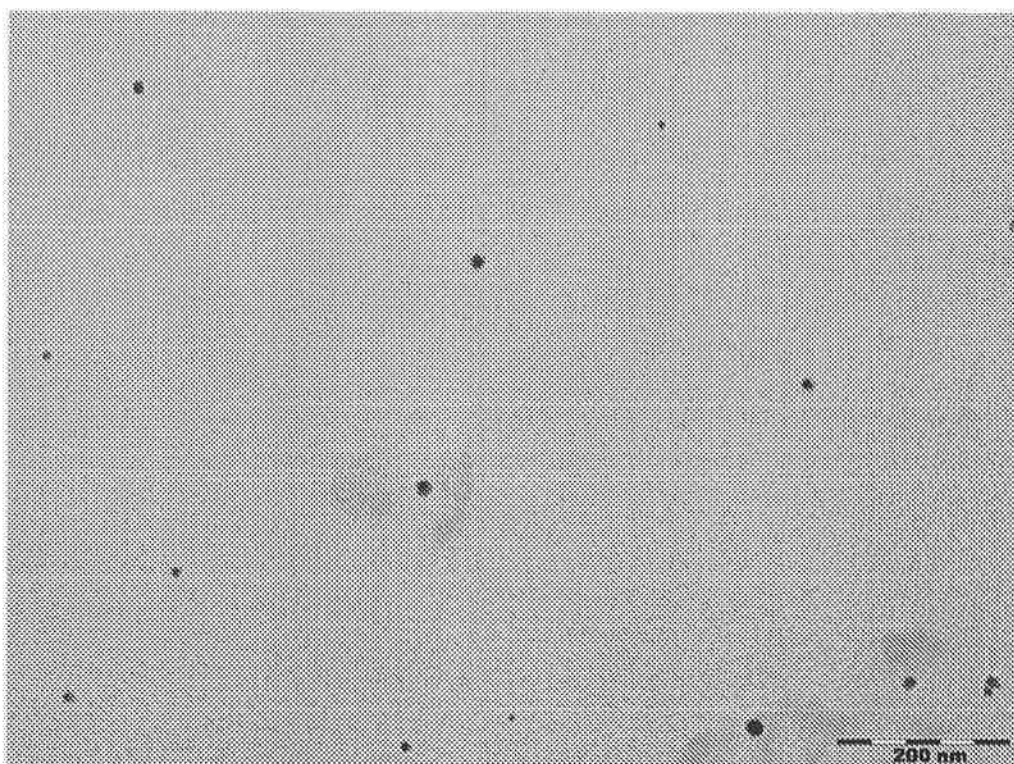
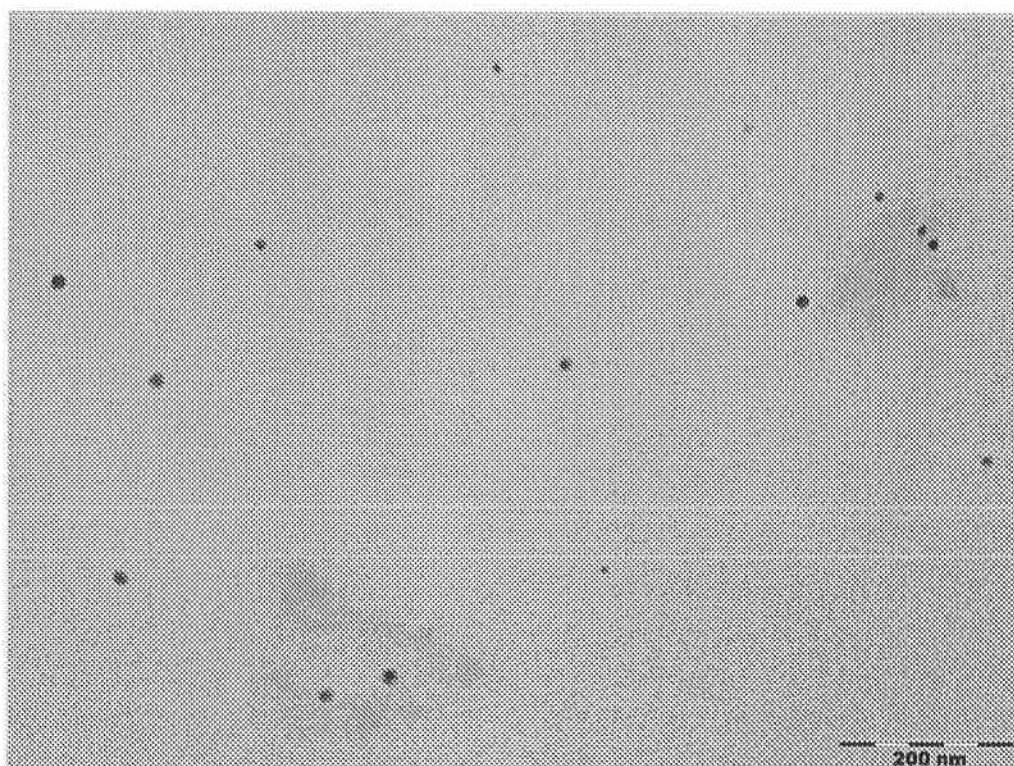


Figure 49c



a1



a2

Figure 50
GB-113

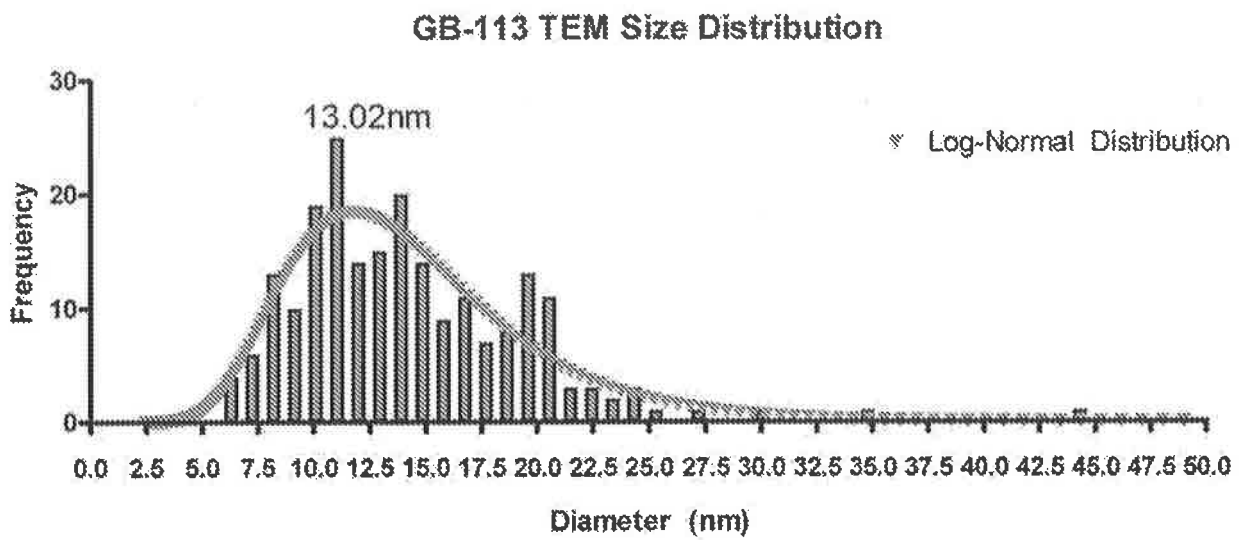


Figure 50b

Gold GB-113
14.10% transmission

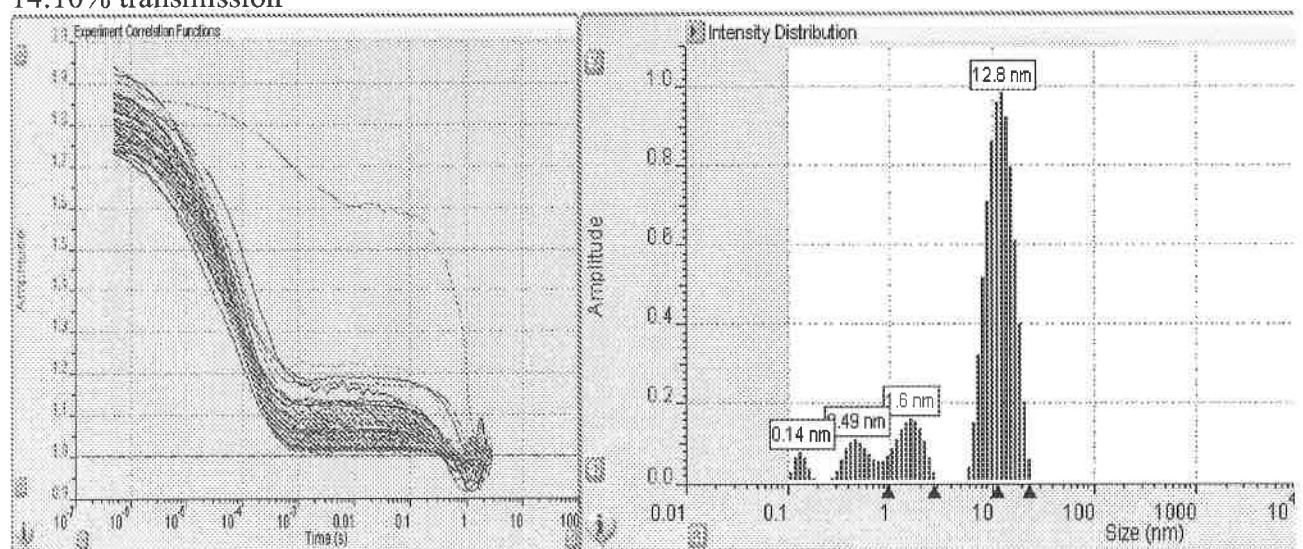
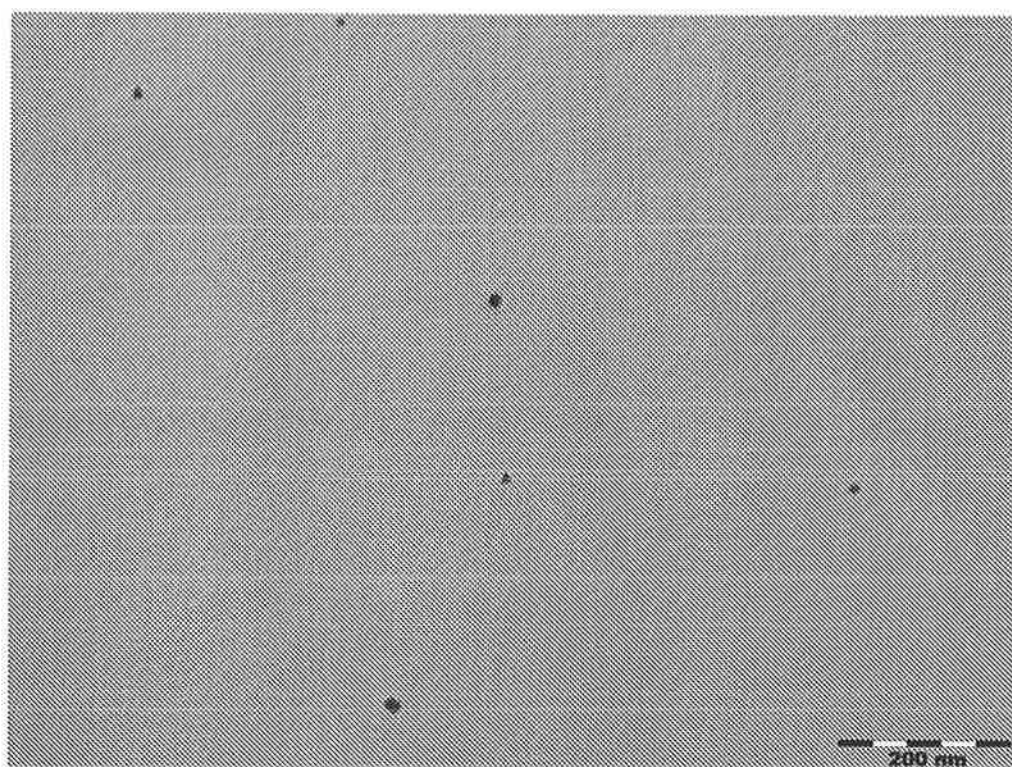
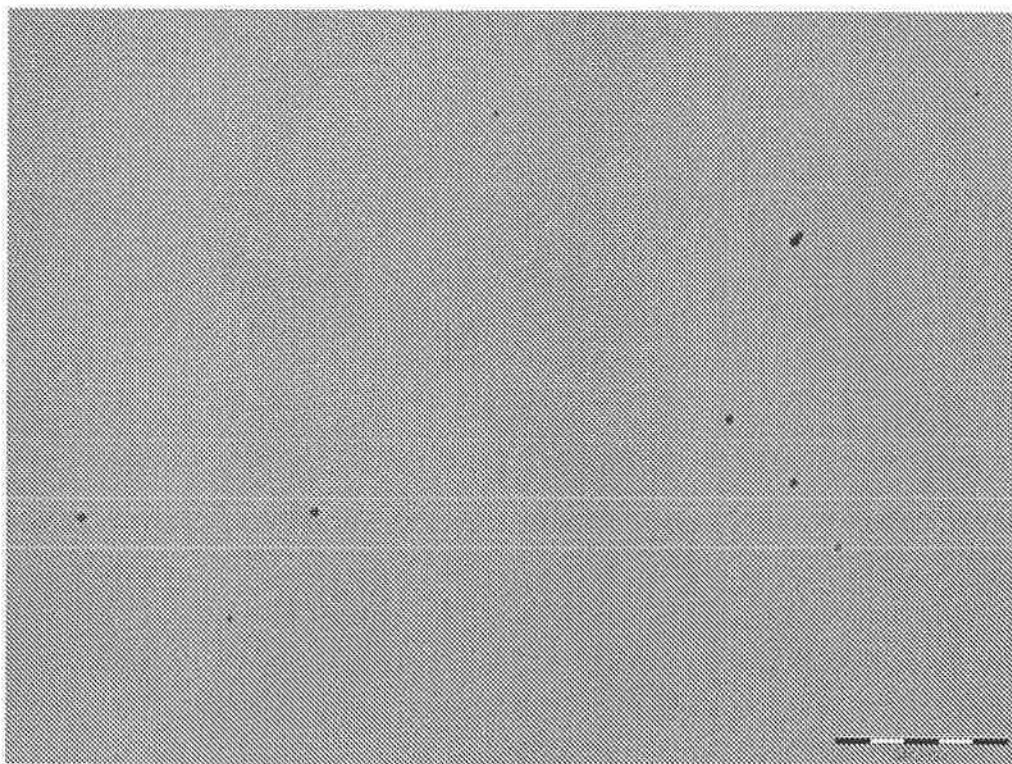


Figure 50c



a1



a2

Figure 51
GB-118

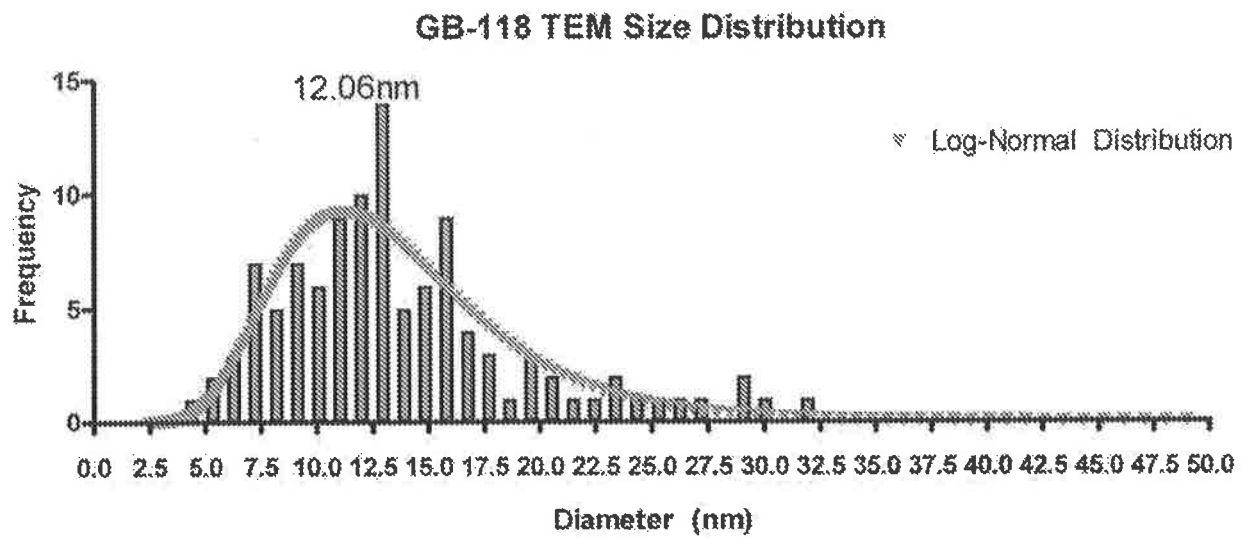


Figure 51b

Gold GB-118
6.60% transmission

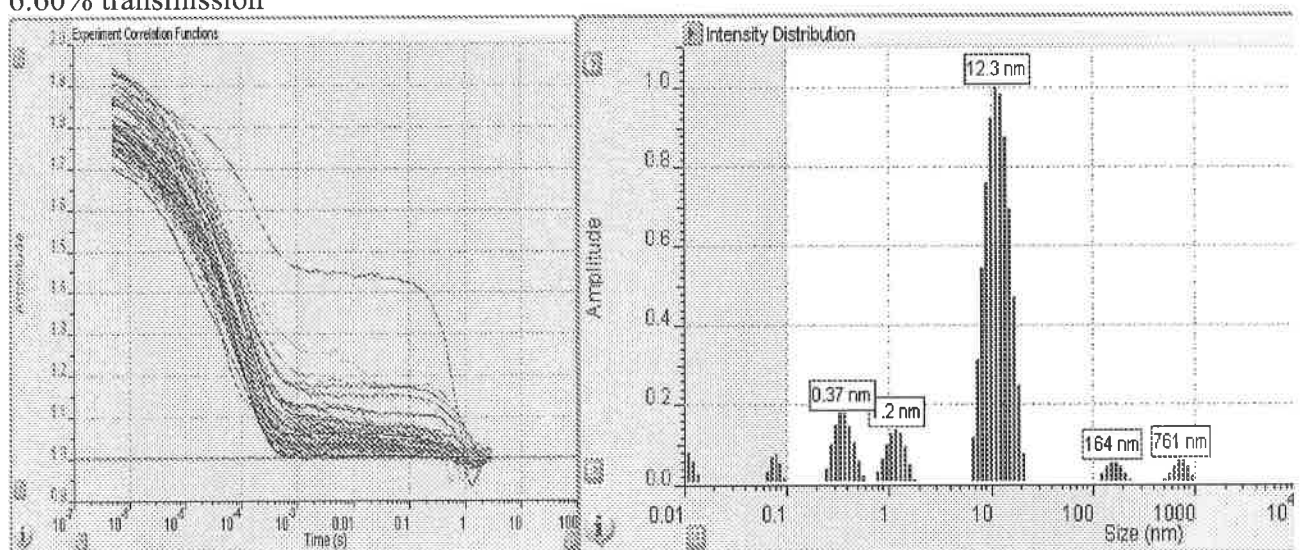
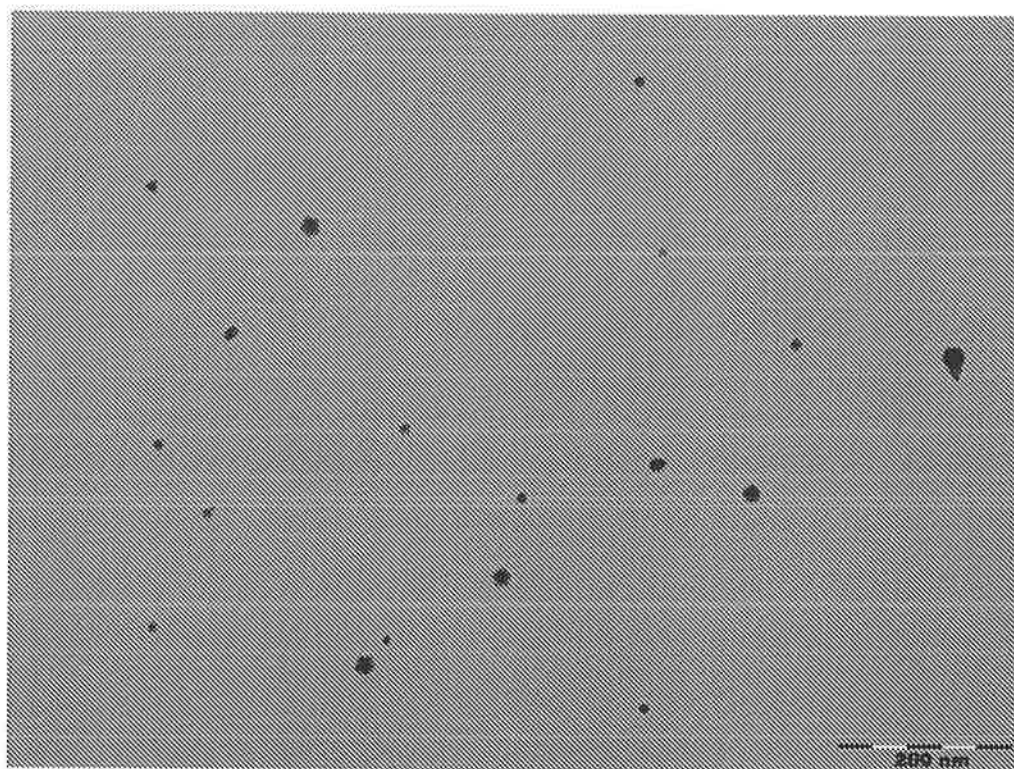
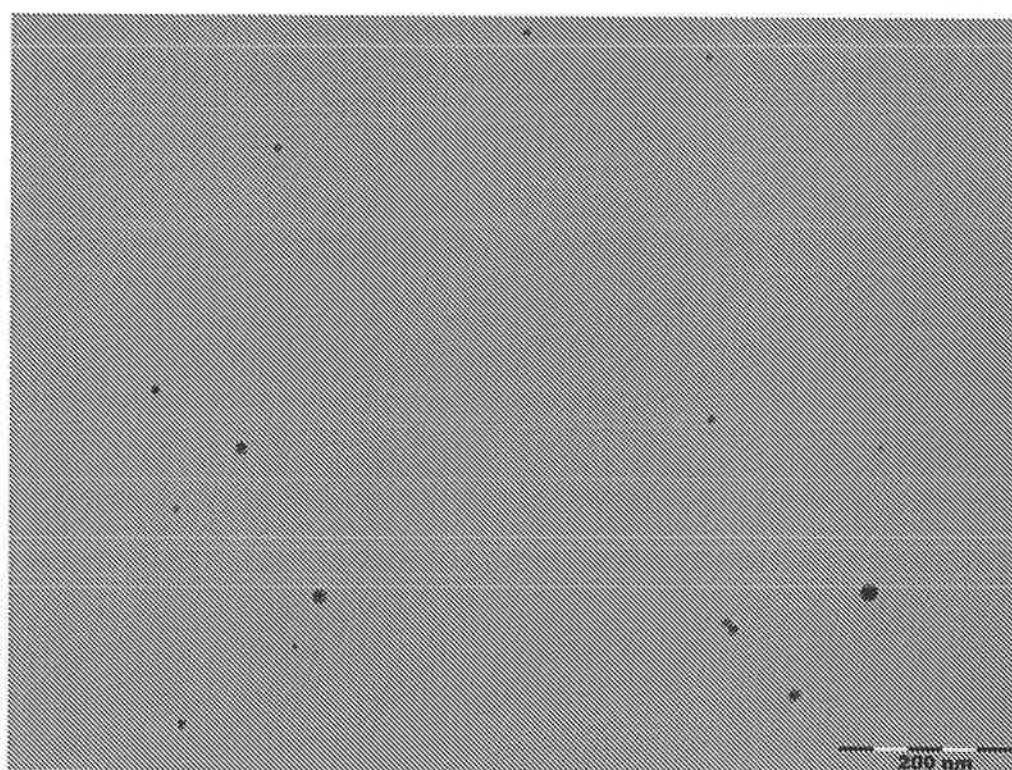


Figure 51c



a1



a2

Figure 52
GB-120

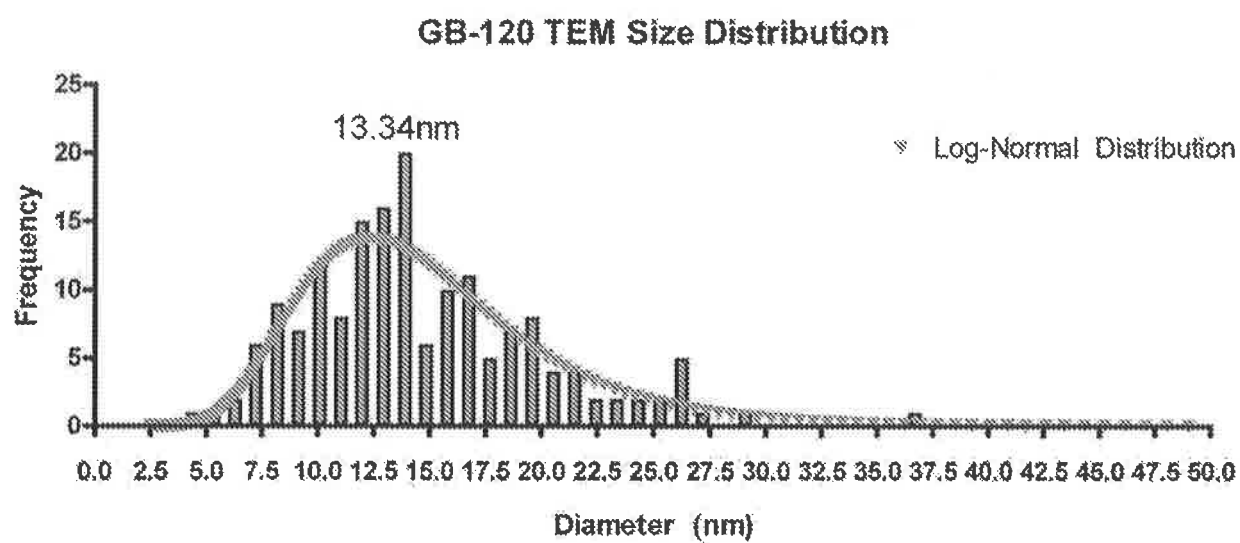


Figure 52b

Gold GB-120
17.36% transmission

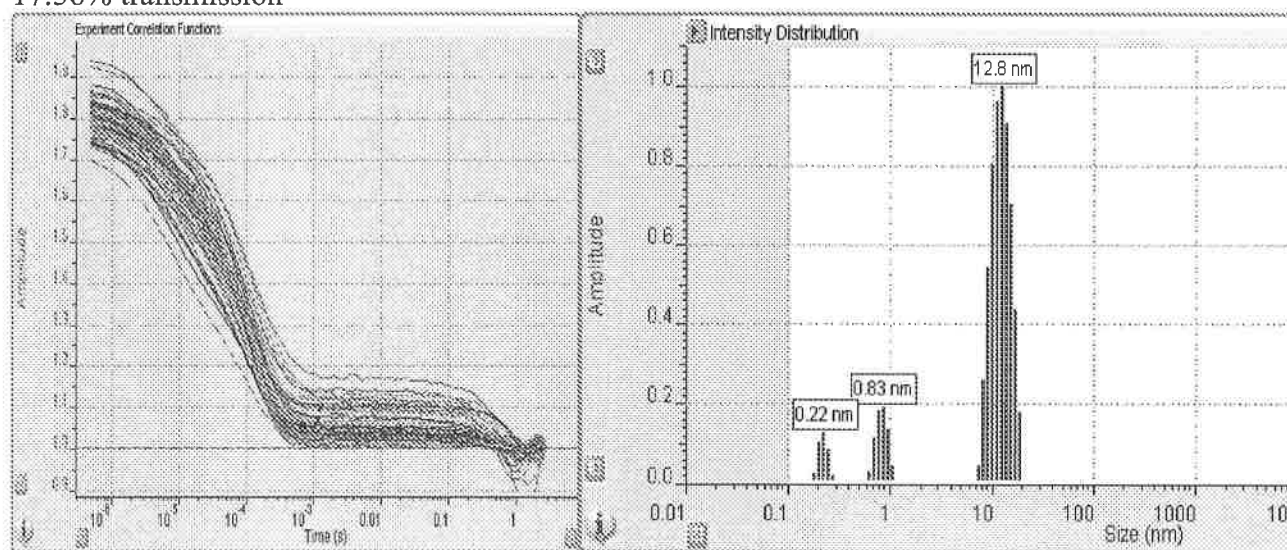
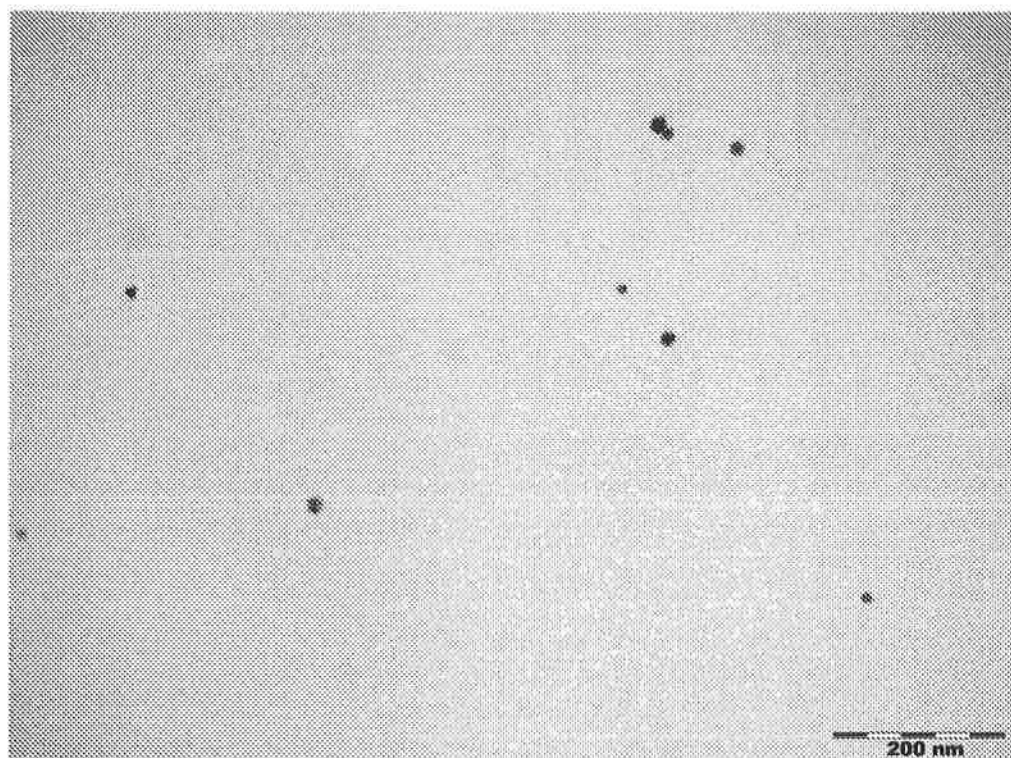
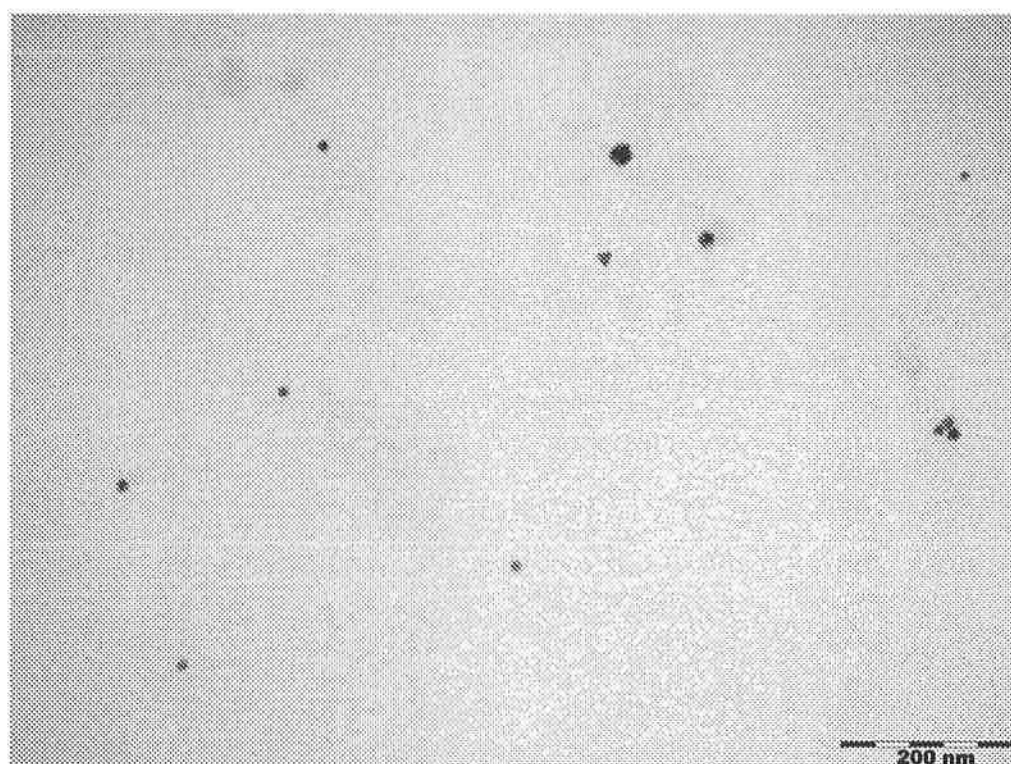


Figure 52c



a1



a2

Figure 53
GB-123

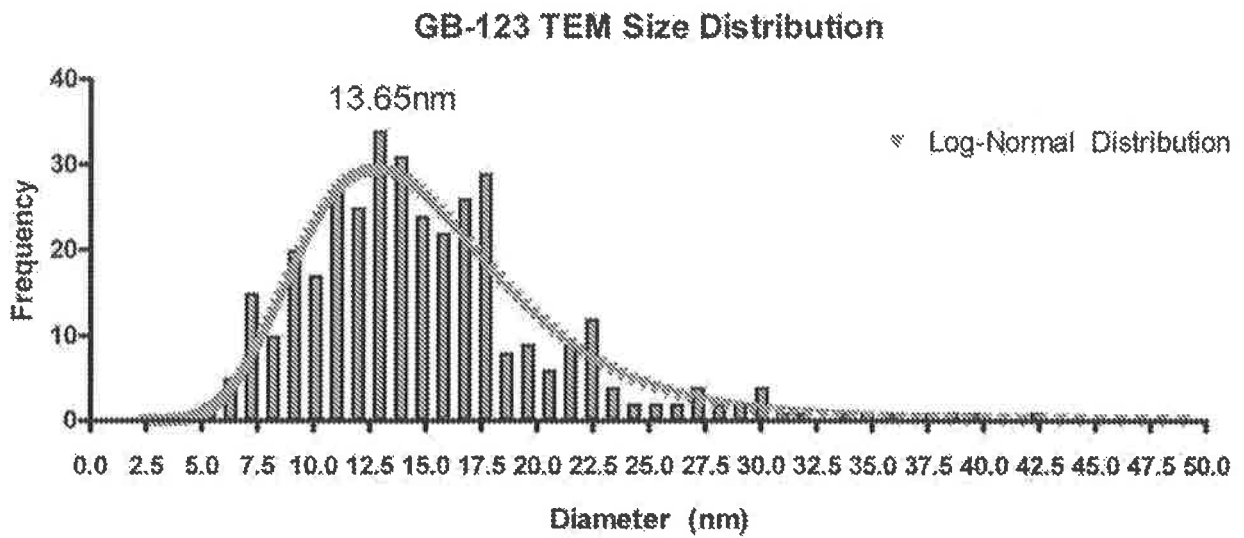


Figure 53b

Gold GB-123
14.00% transmission

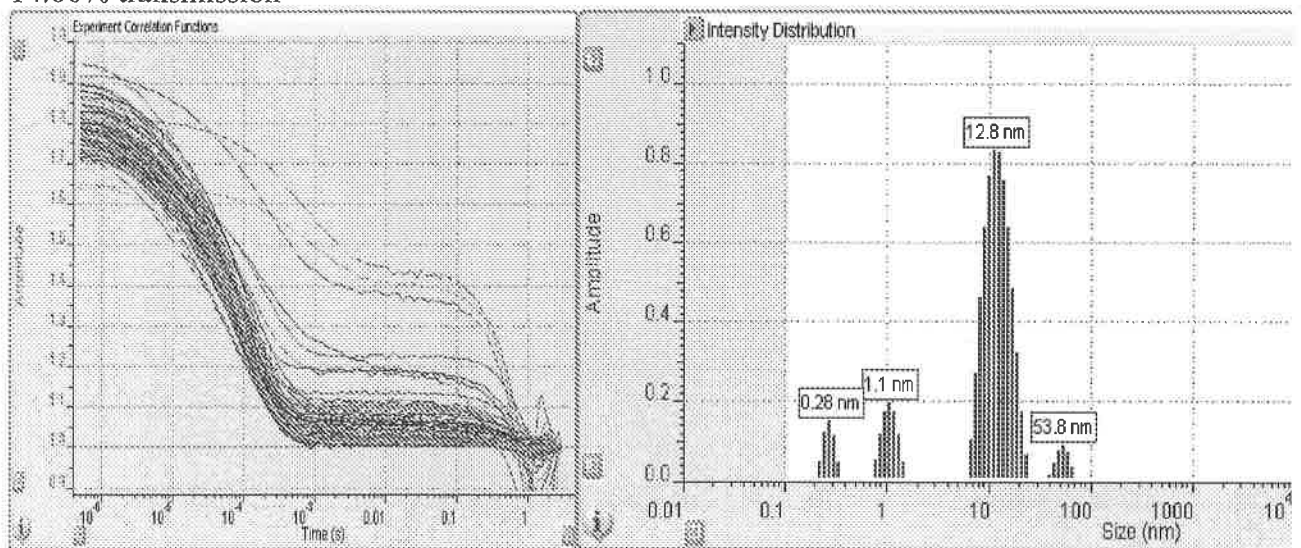
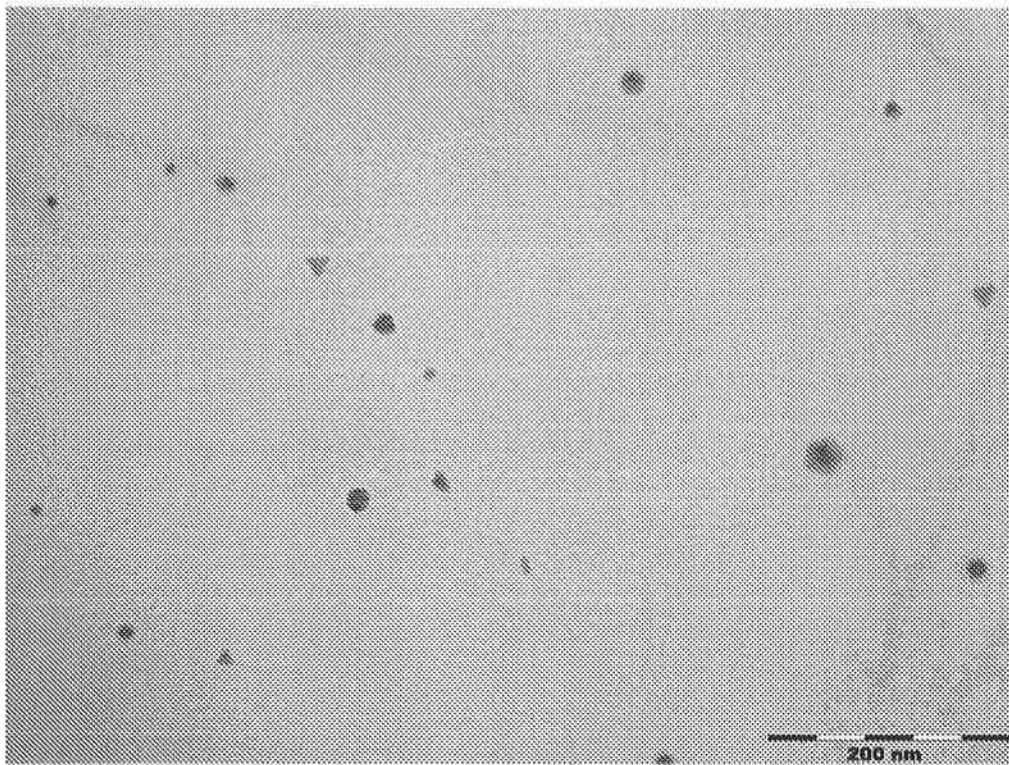
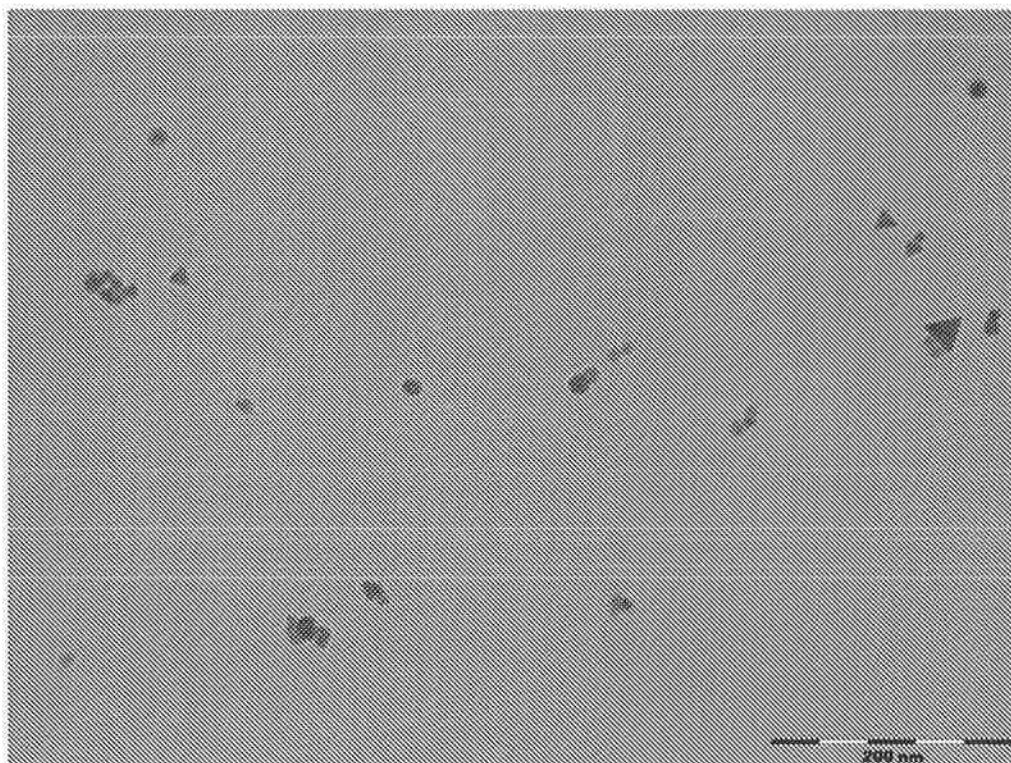


Figure 53c



a1



a2

Figure 54
GB-139

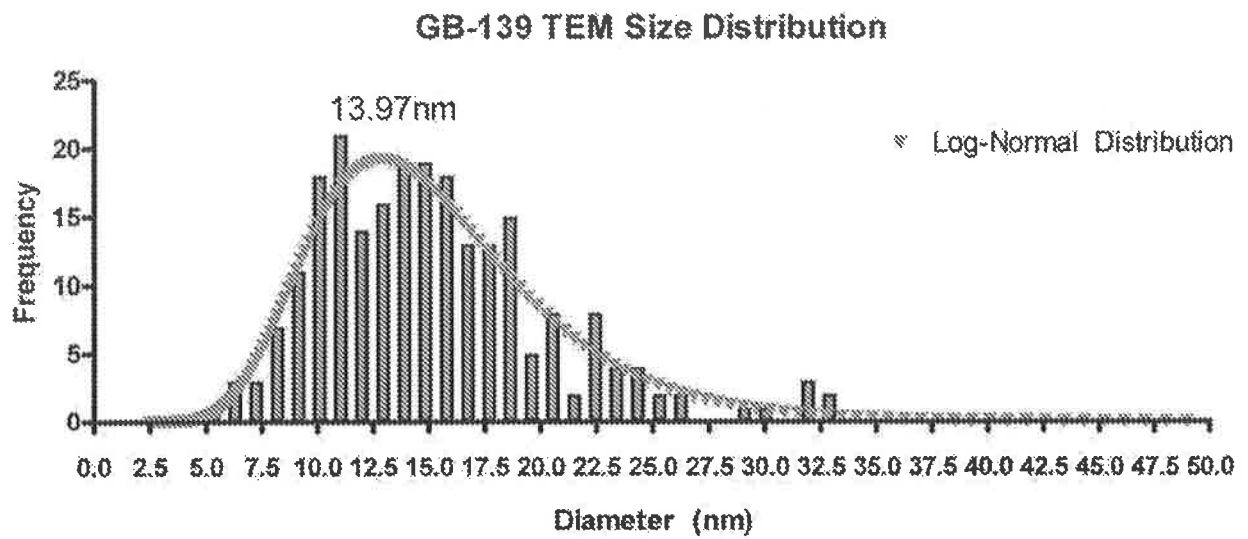


Figure 54b

Gold GB-139
5.28% transmission

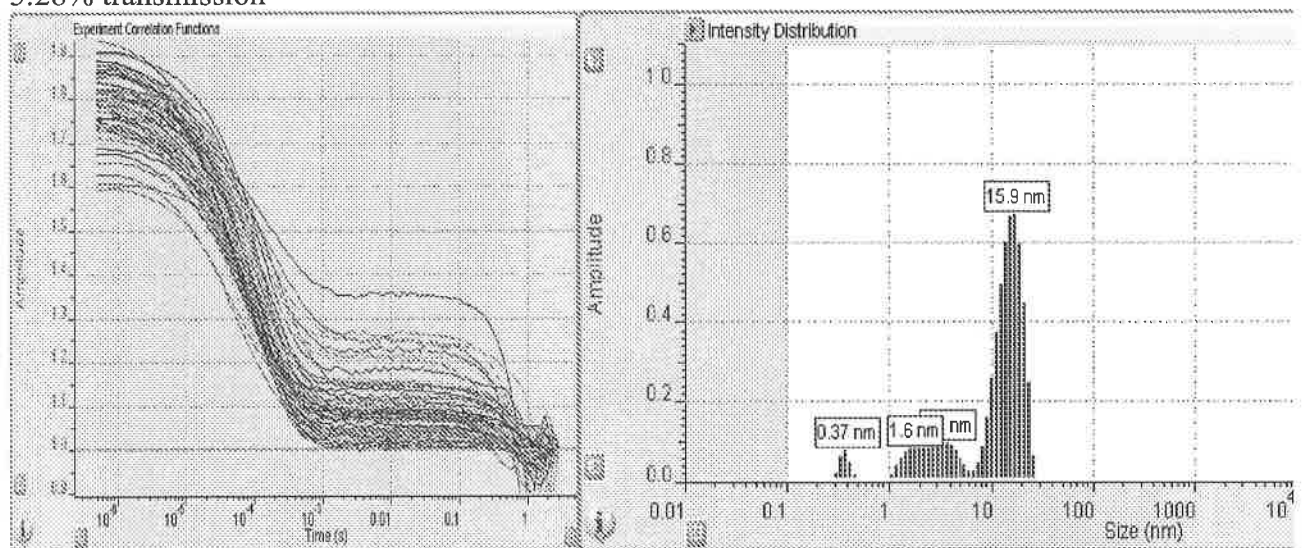
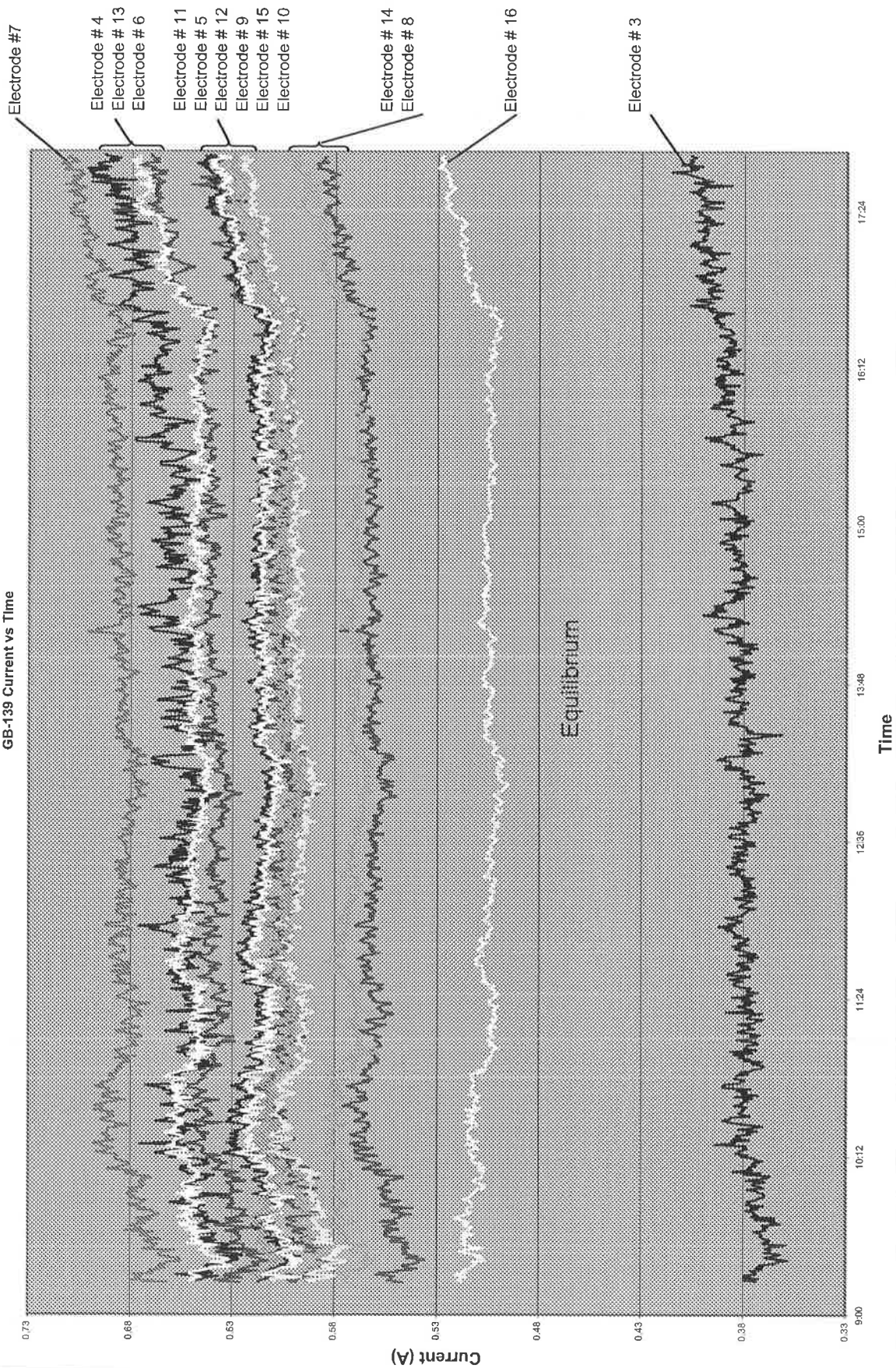
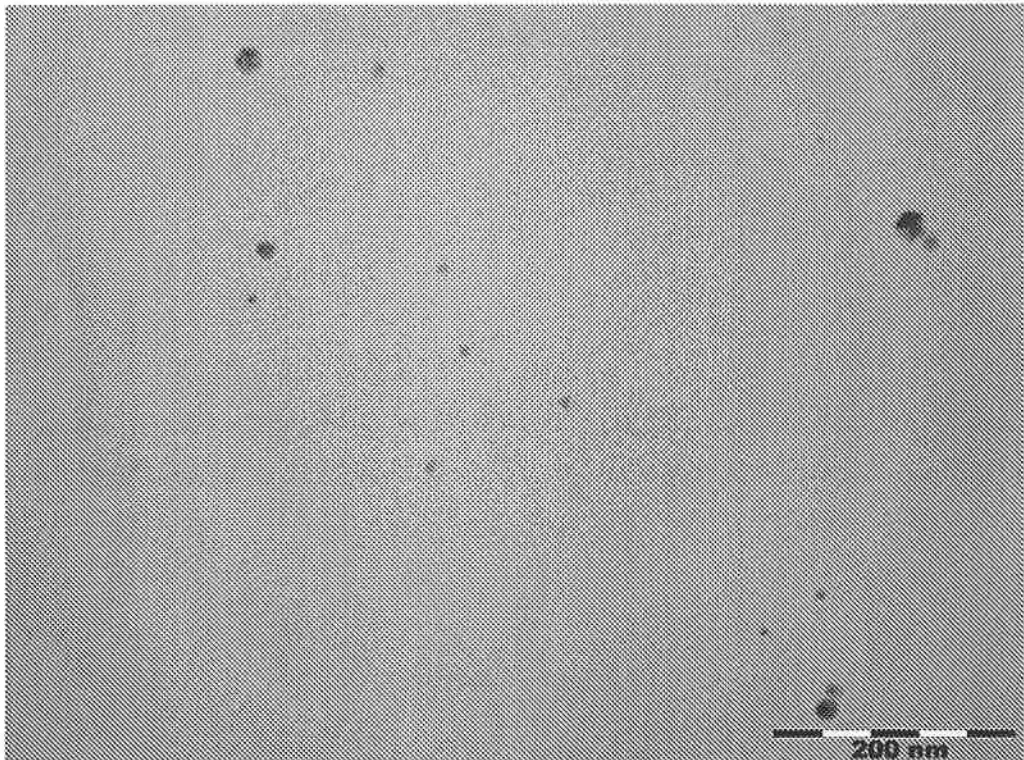


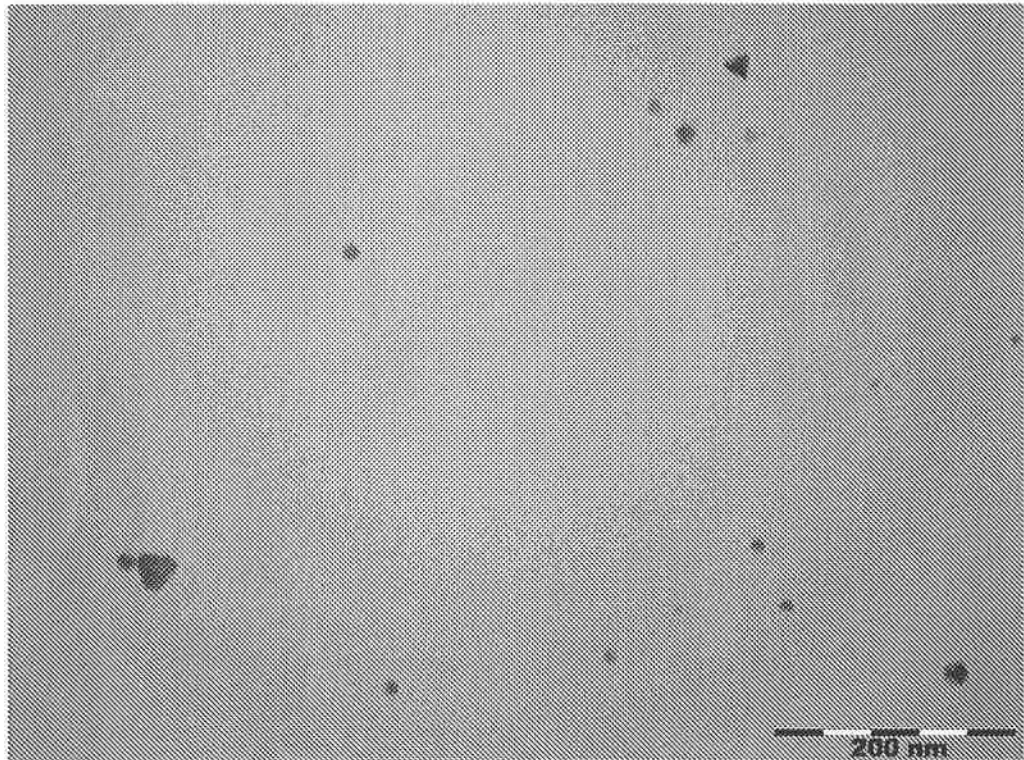
Figure 54c

Figure 54d
GB-139 Current vs Time





a1



a2

Figure 55
GB-141

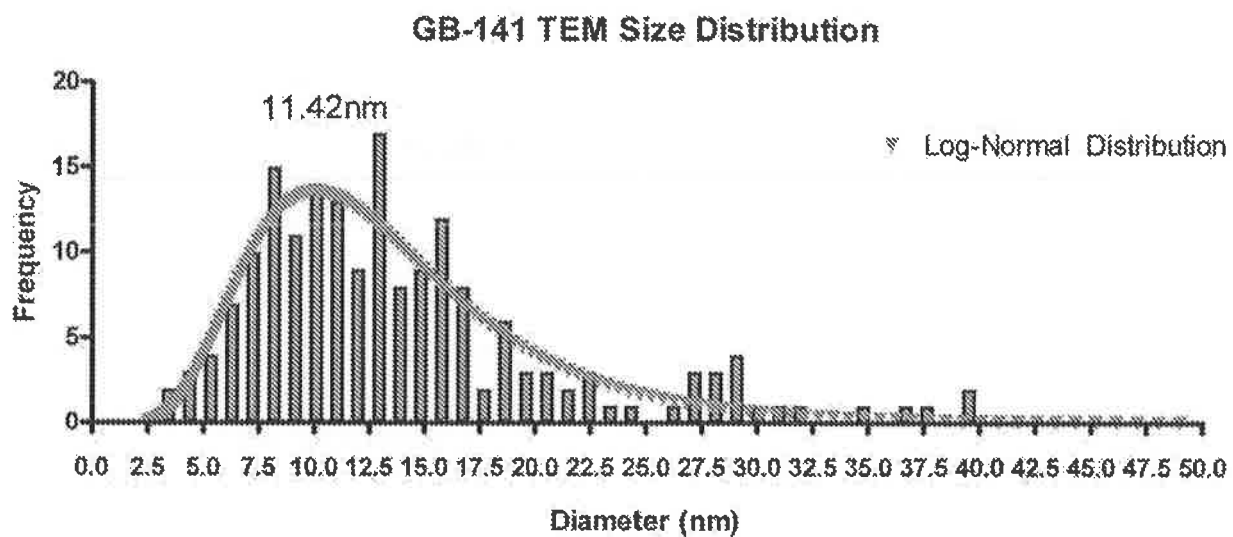


Figure 55b

Gold GB-141
5.42% transmission

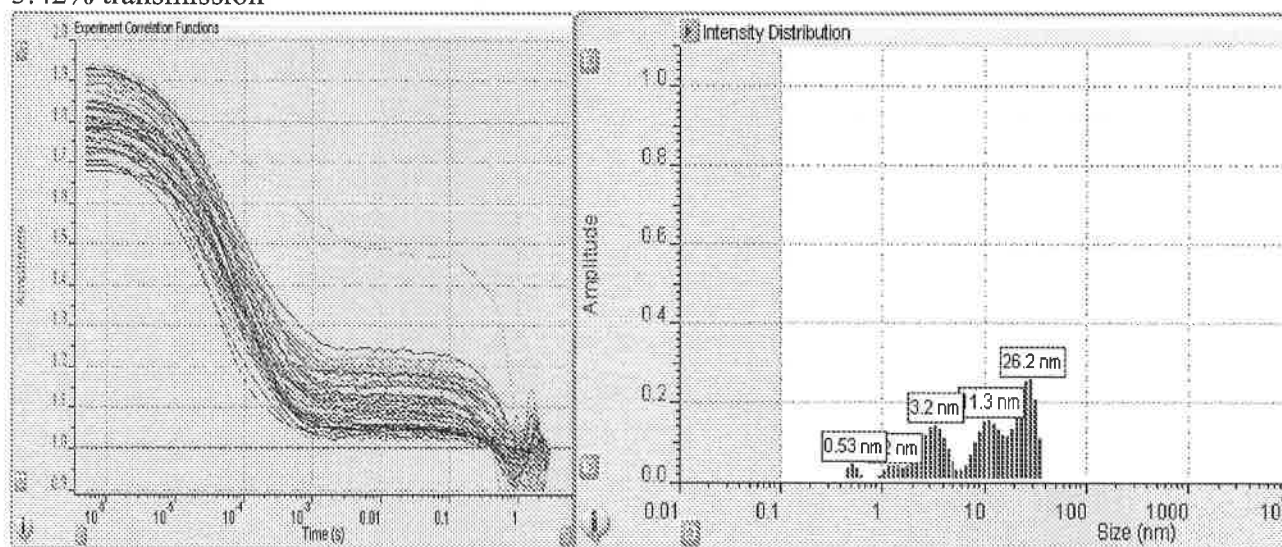
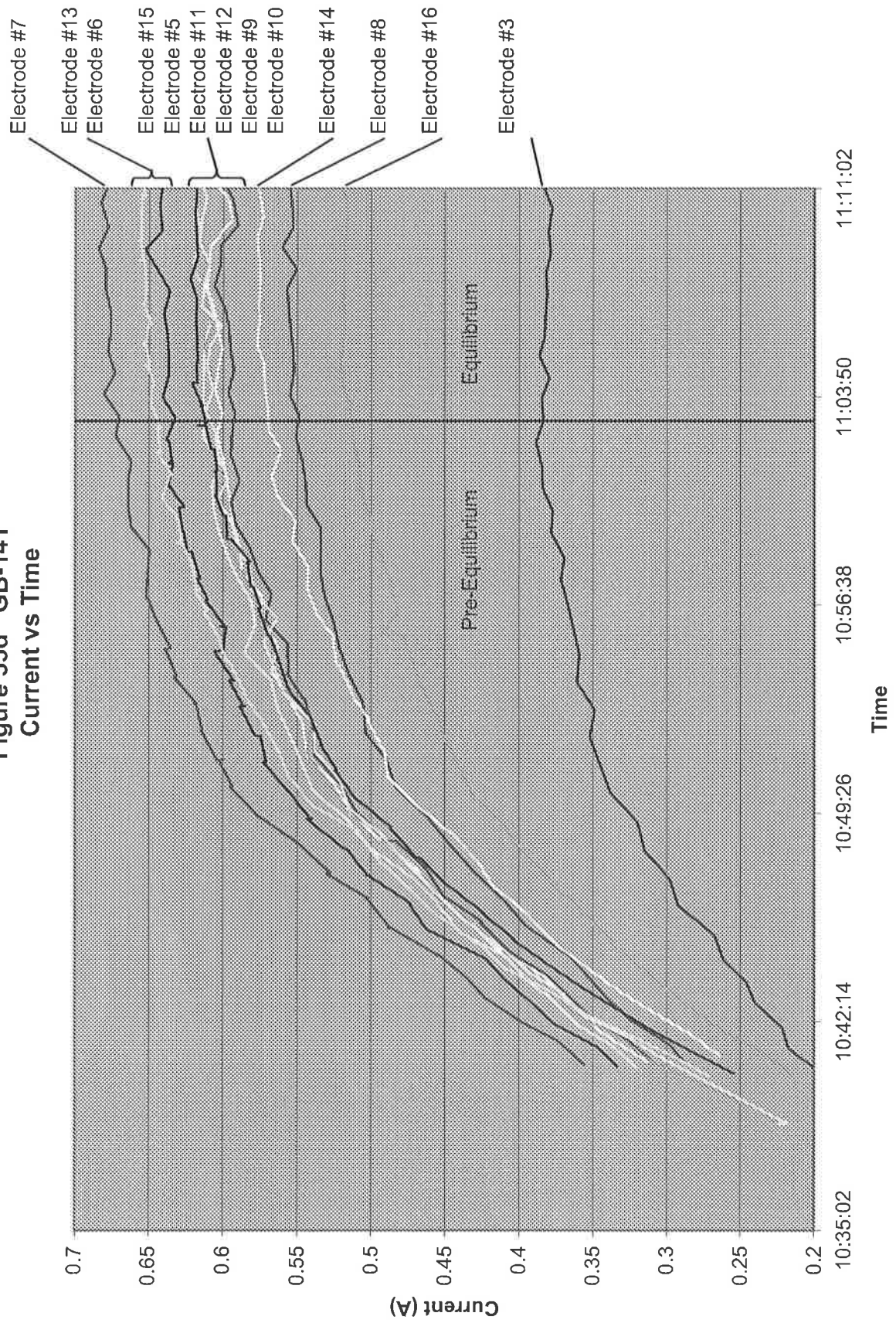
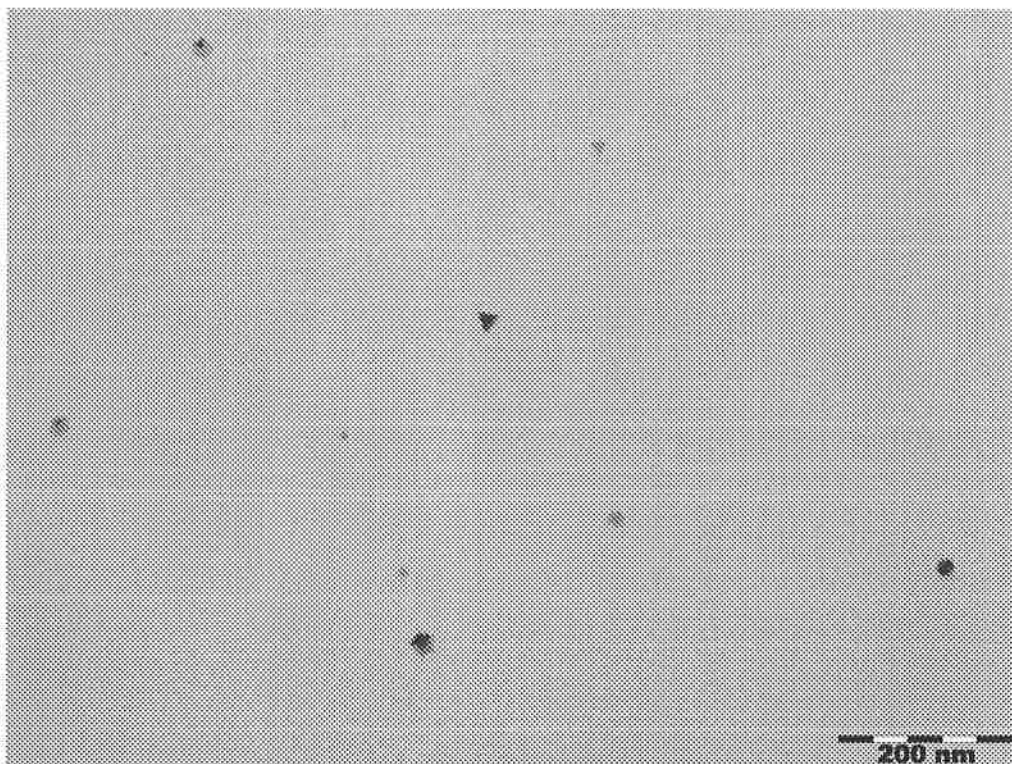


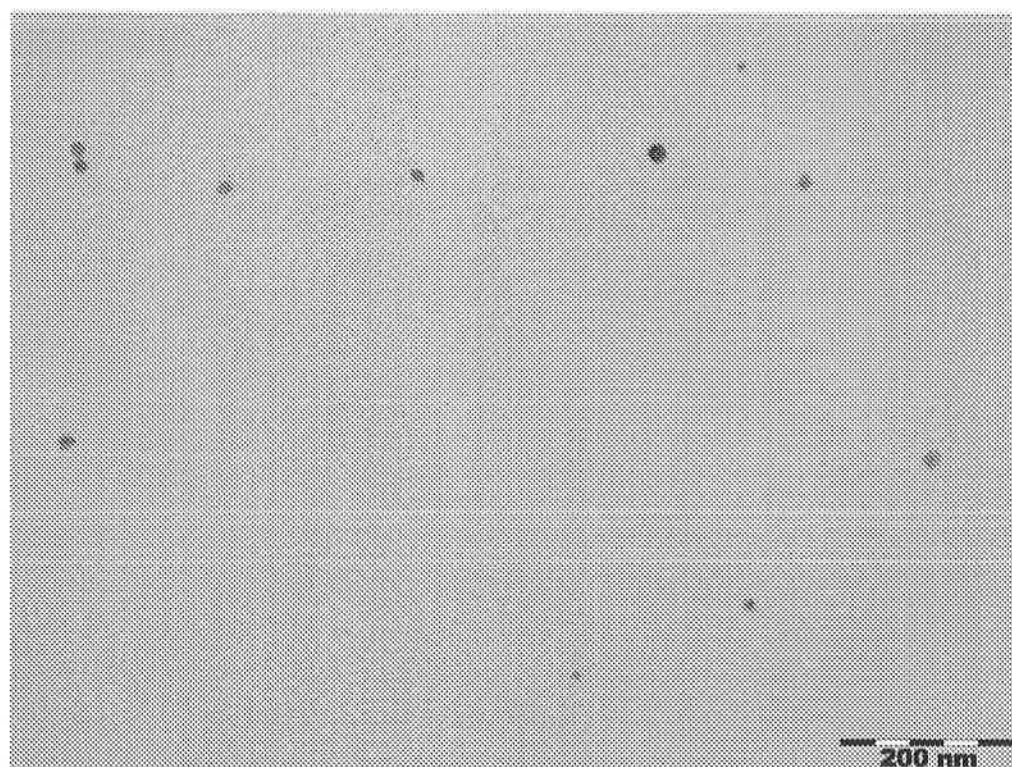
Figure 55c

Figure 55d GB-141
Current vs Time





a1



a2

Figure 56
GB-144

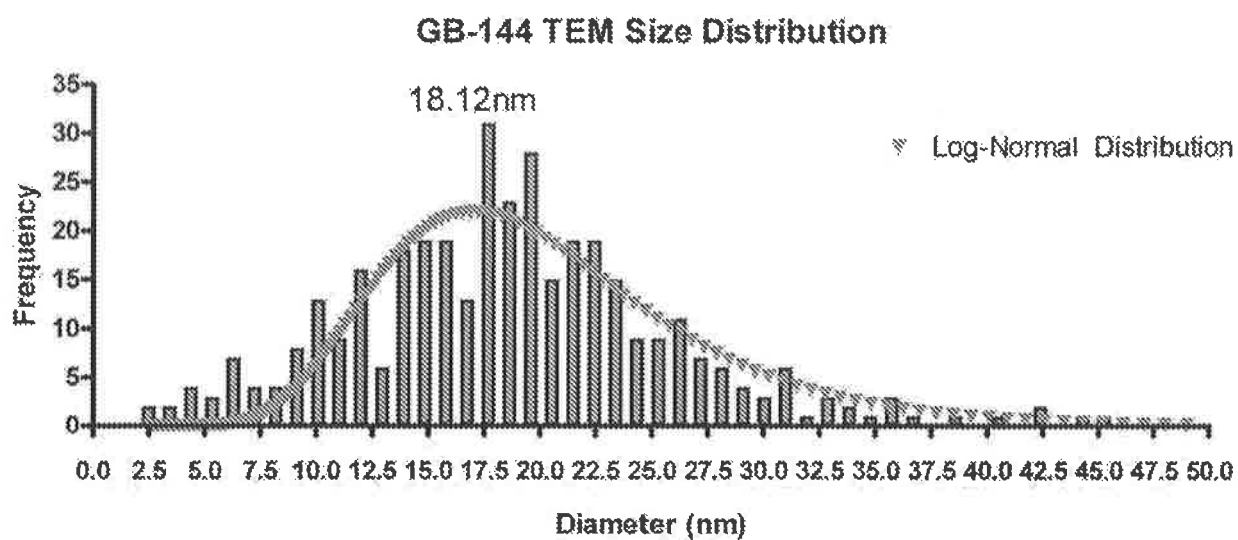


Figure 56b

Gold GB-144
4.02% transmission

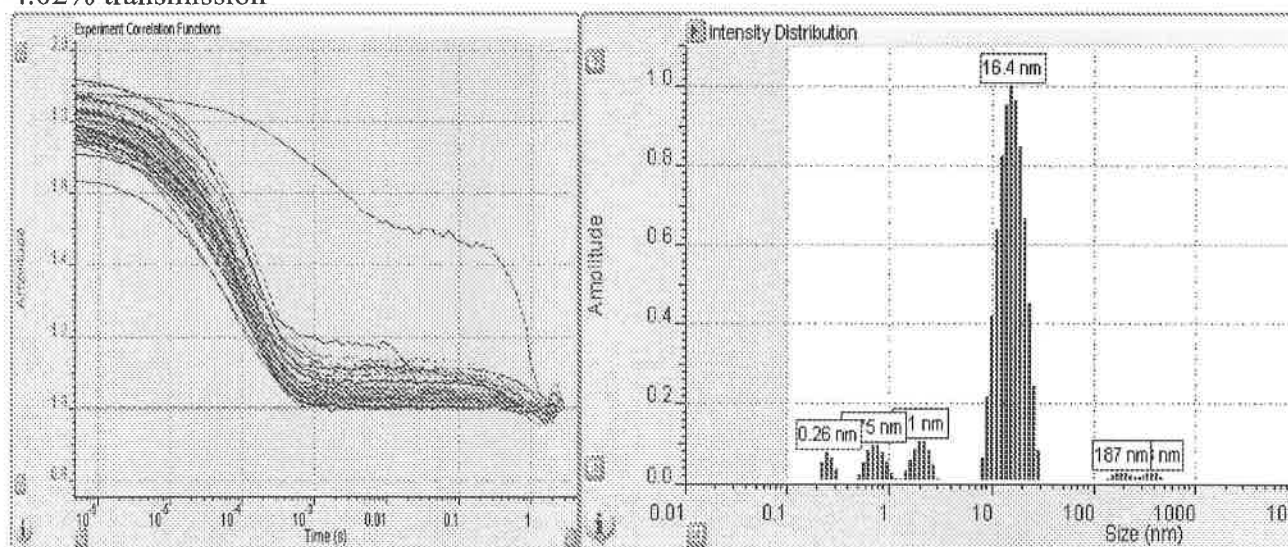
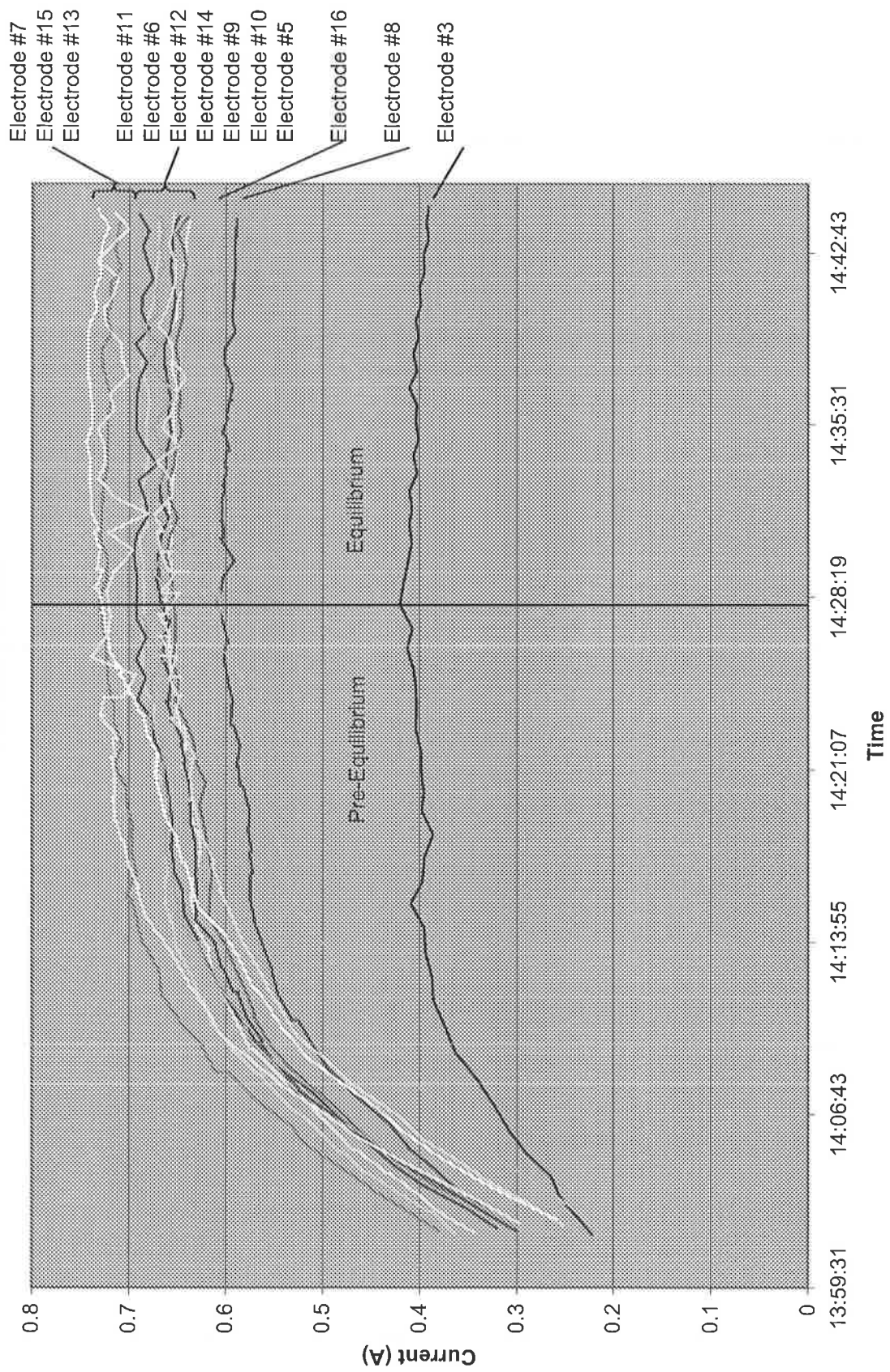
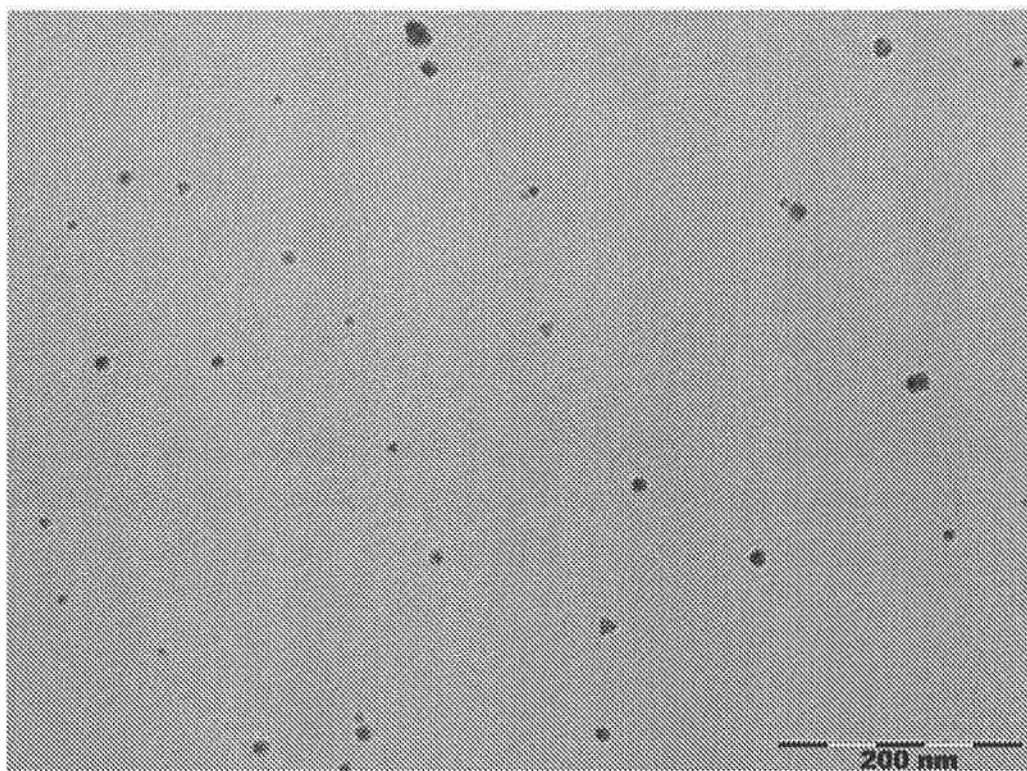


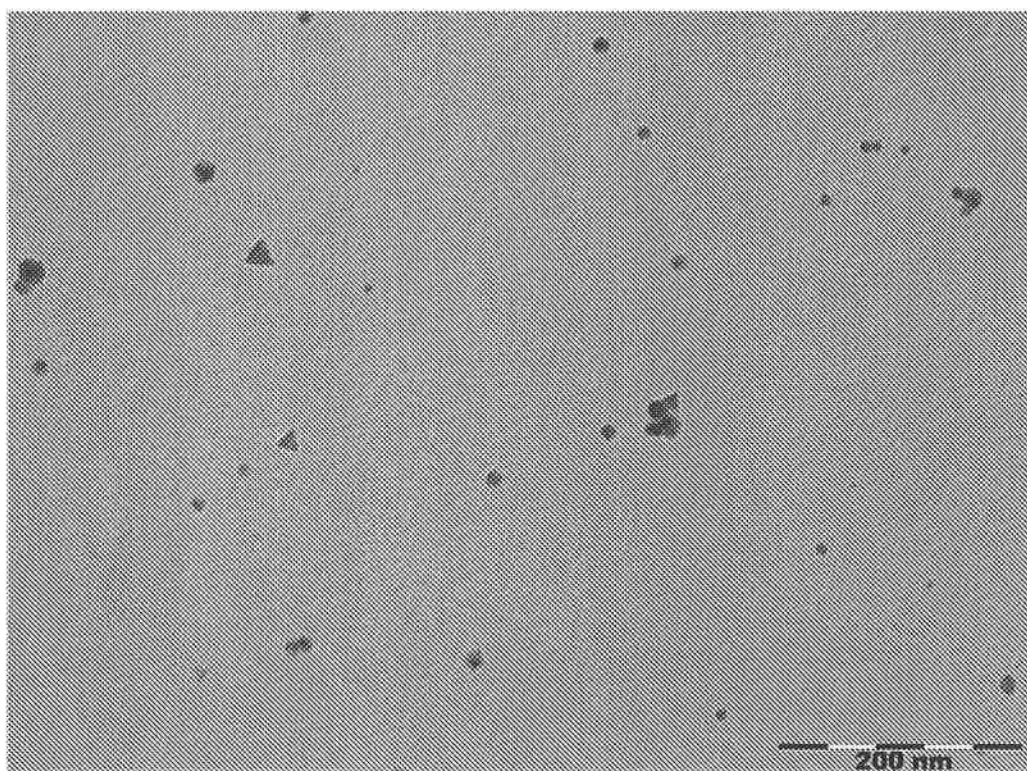
Figure 56c

Figure 56d GB-144
Current vs Time





a1



a2

Figure 57
GB-079

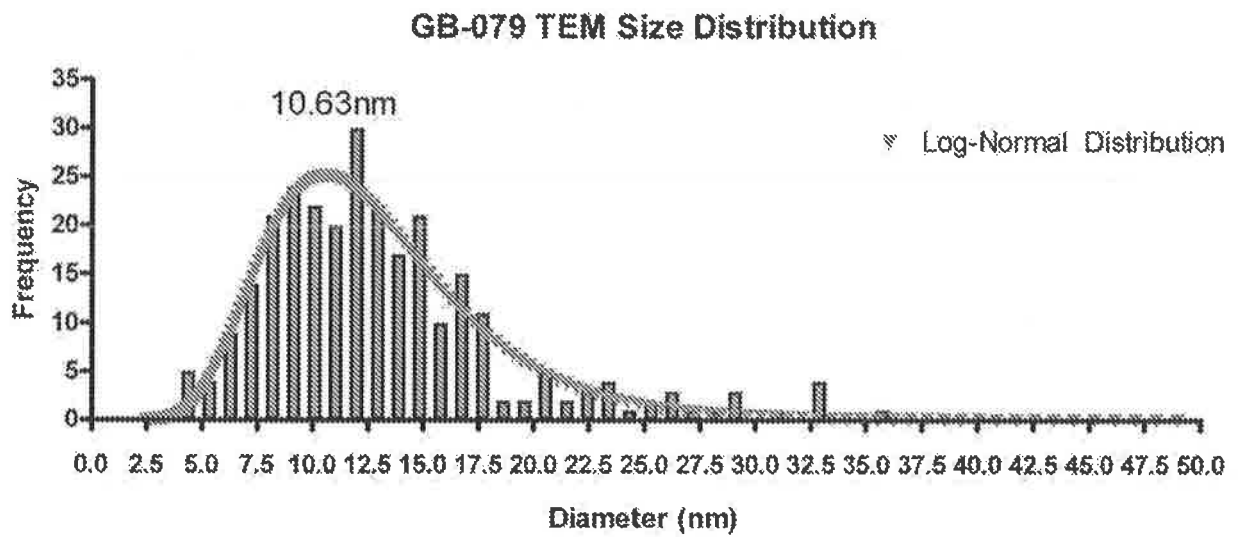


Figure 57b

Gold GB-079
6.64% transmission

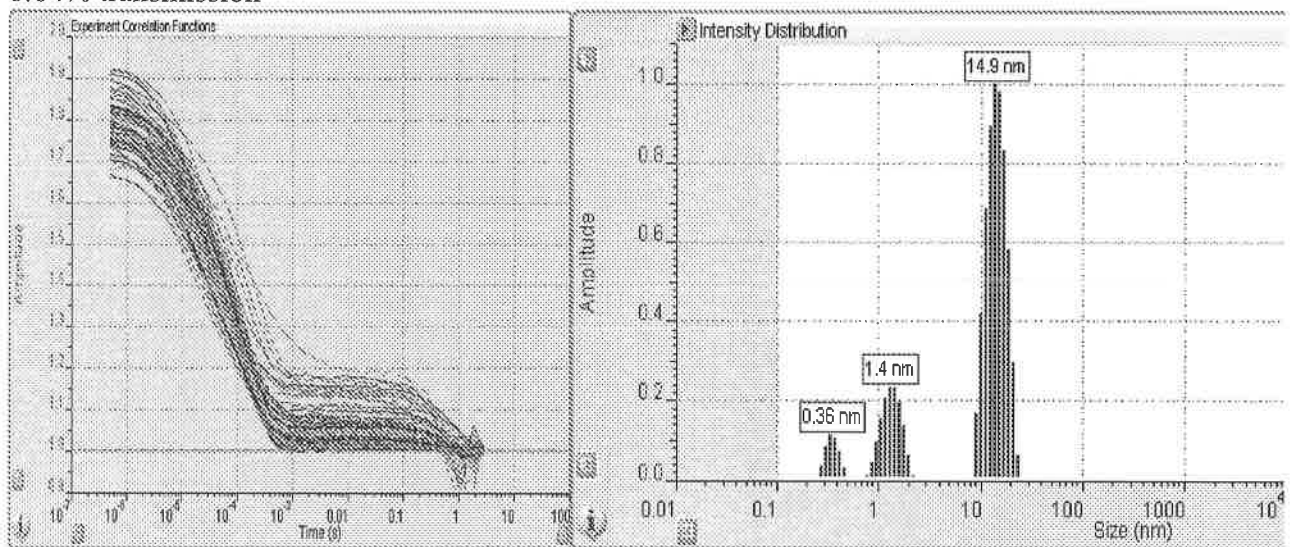
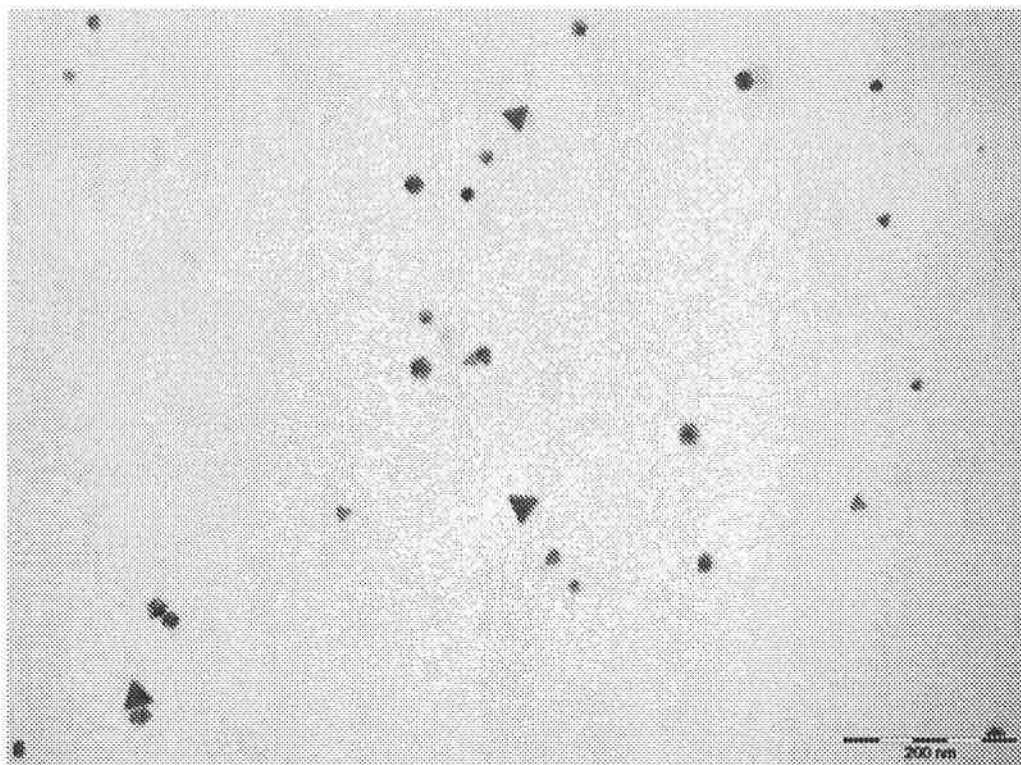
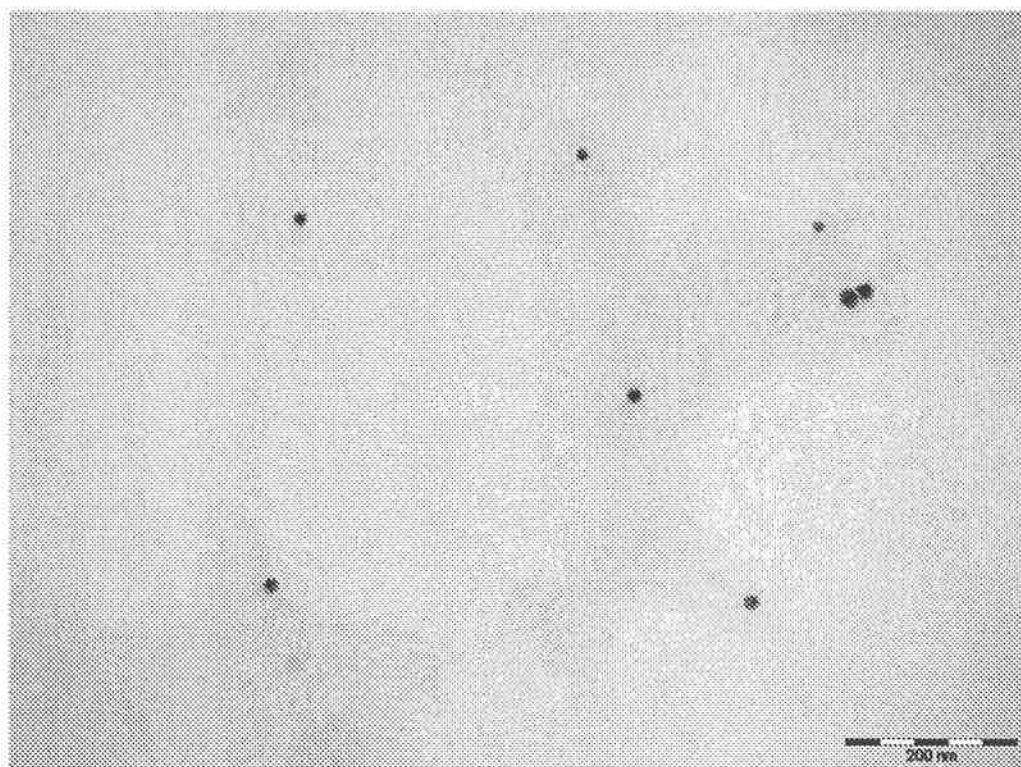


Figure 57c



a1



a2

Figure 58
GB-089

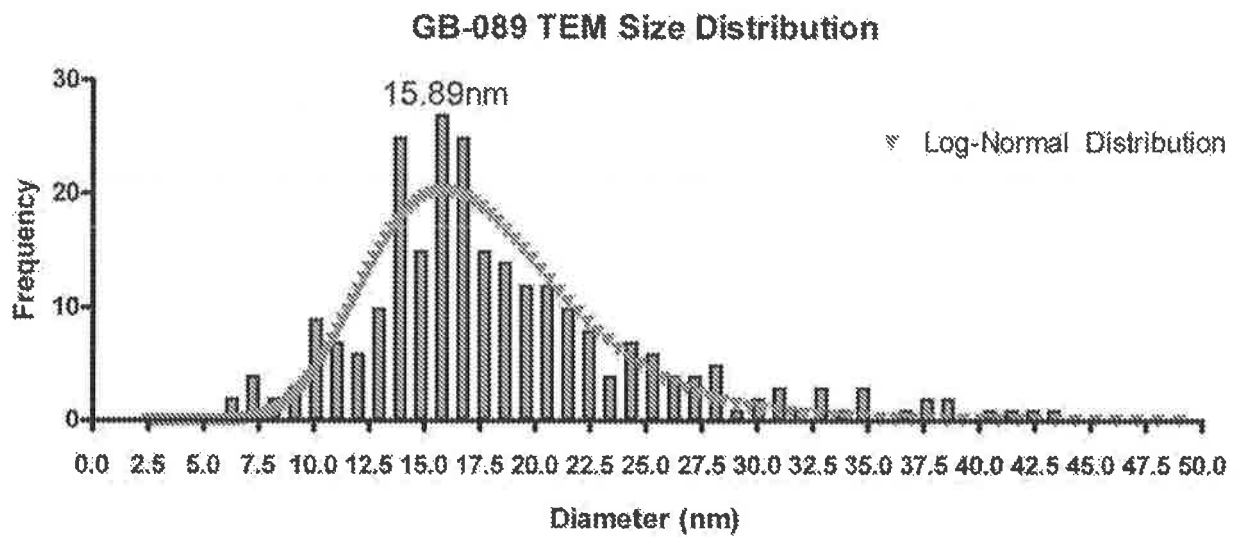


Figure 58b

Gold GB-089
5.70% transmission

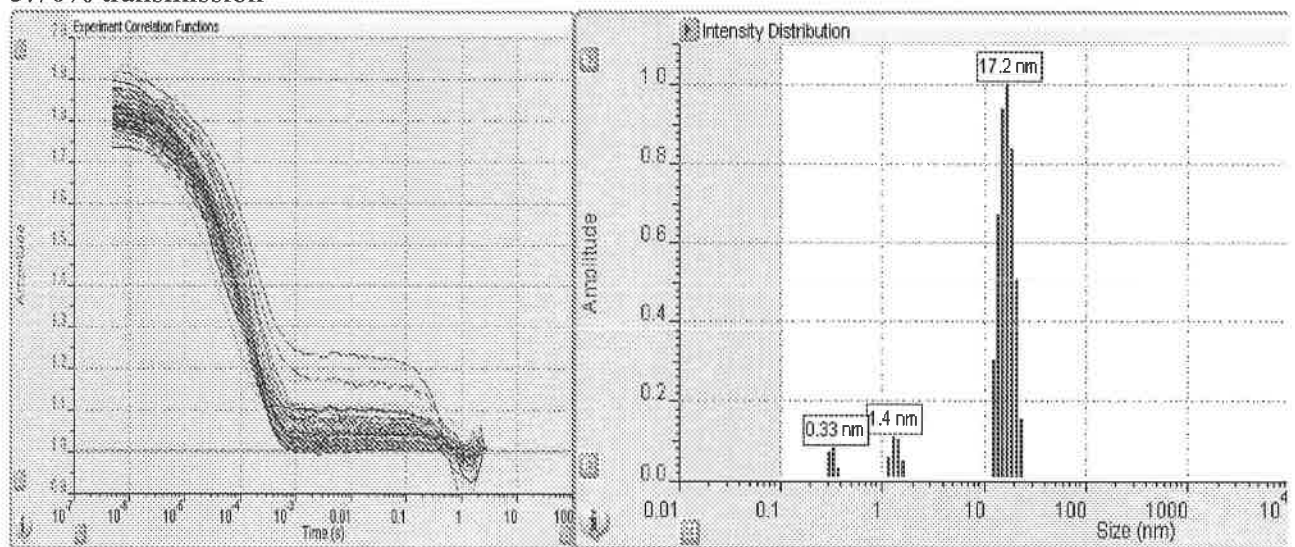
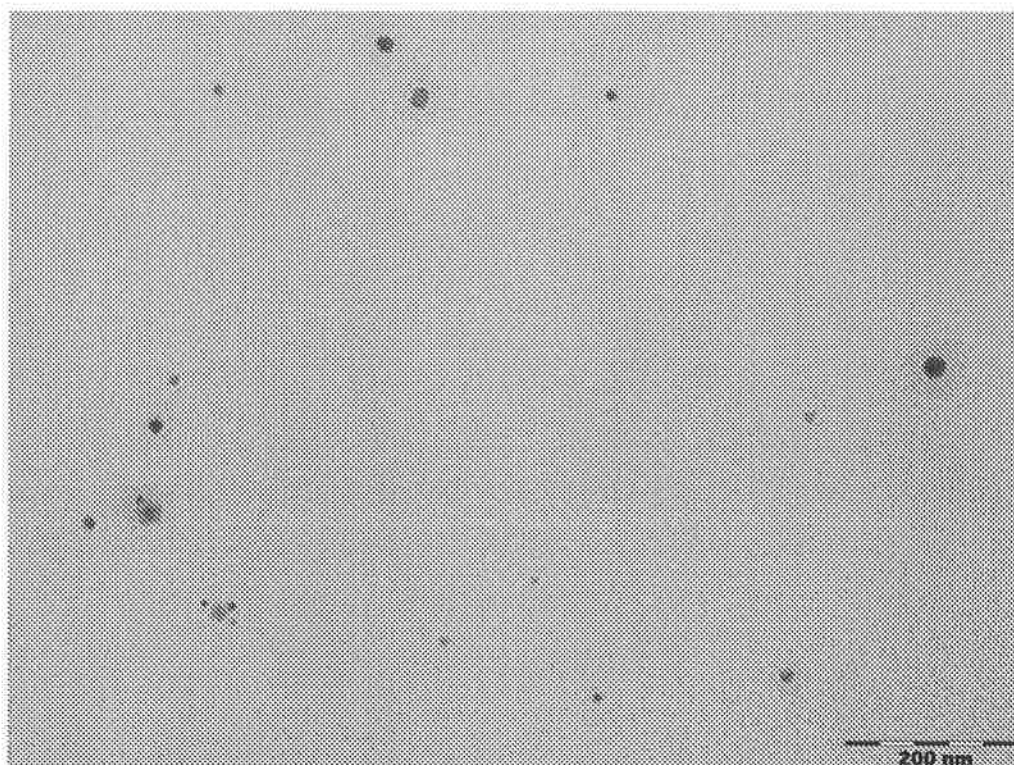
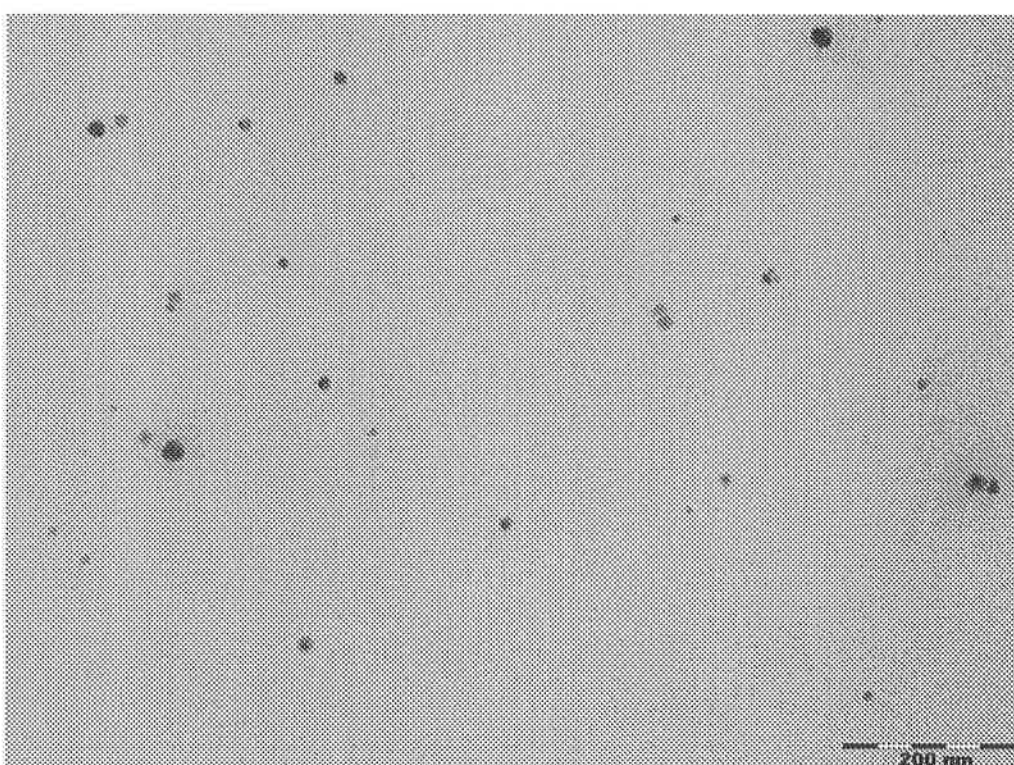


Figure 58c



a1



a2

Figure 59
GB-062

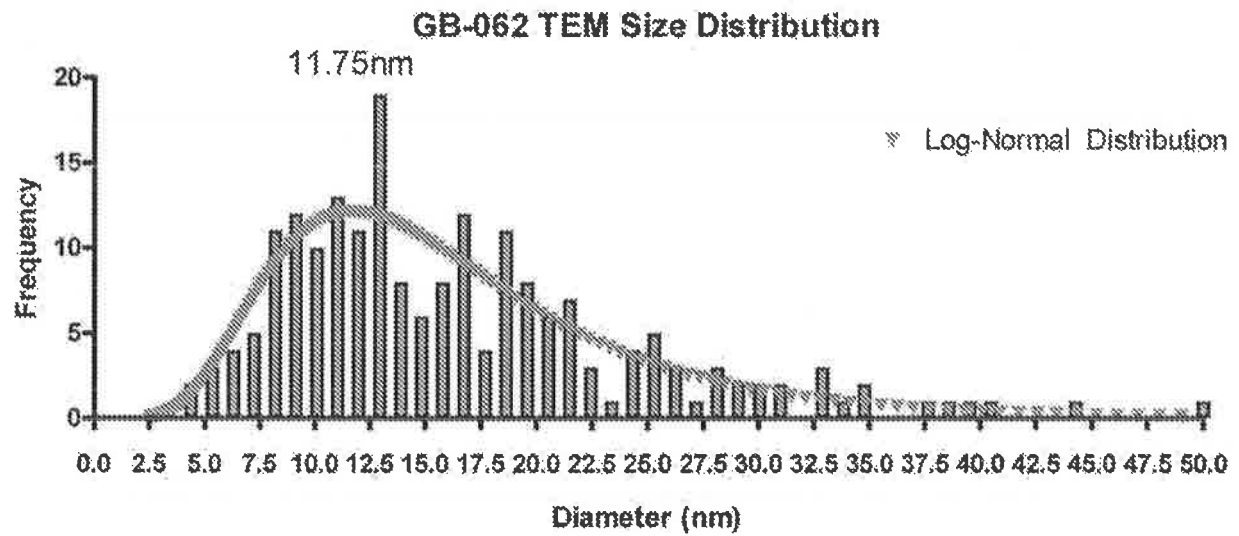


Figure 59b

Gold GB-62
2.29% transmission

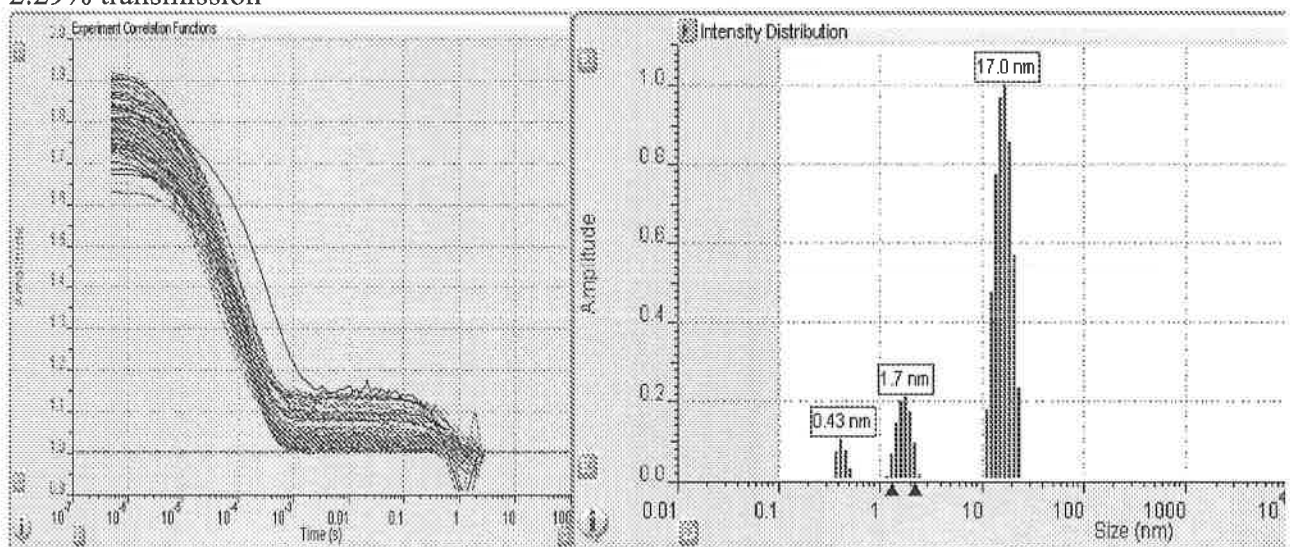
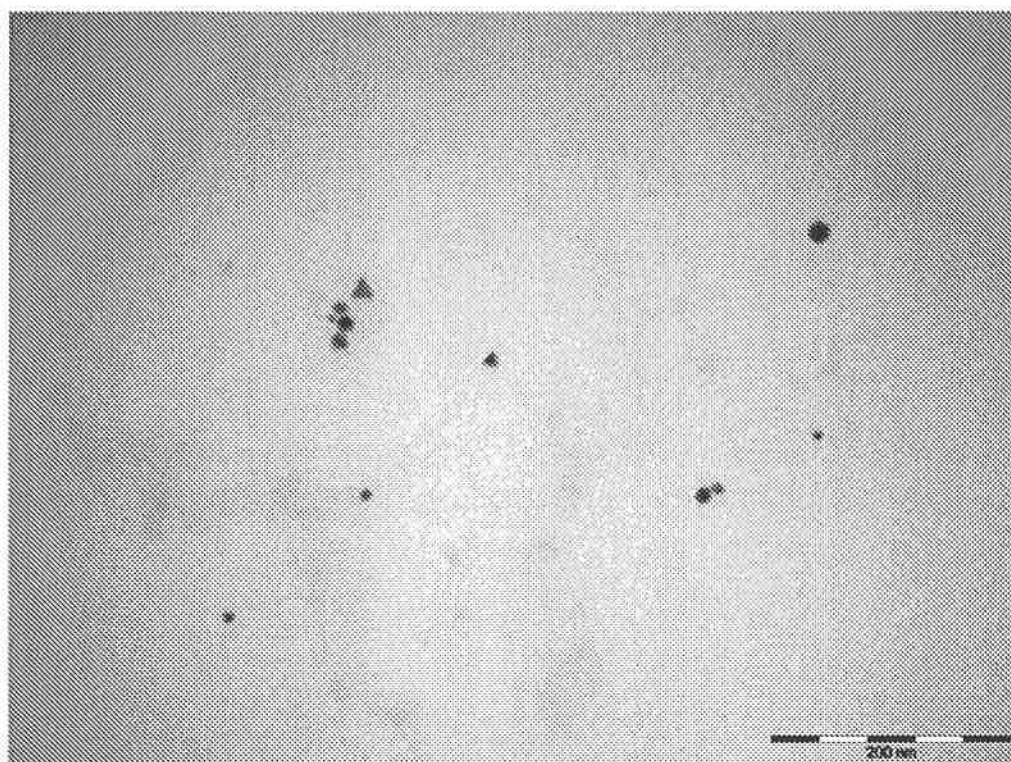
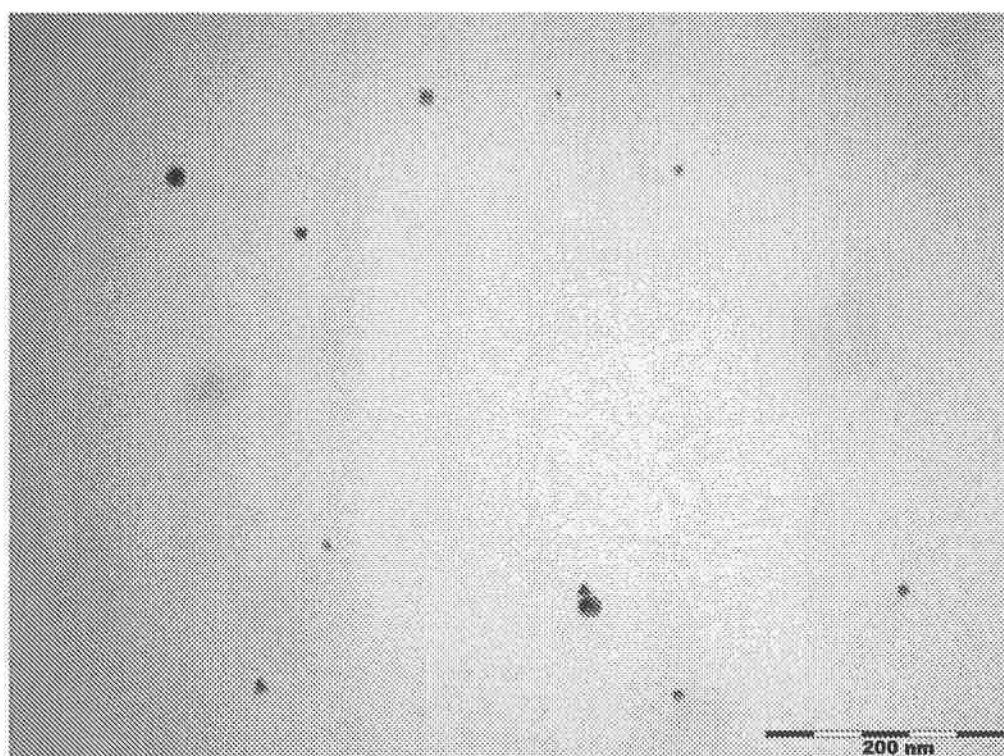


Figure 59c



a1



a2

Figure 60
GB-076

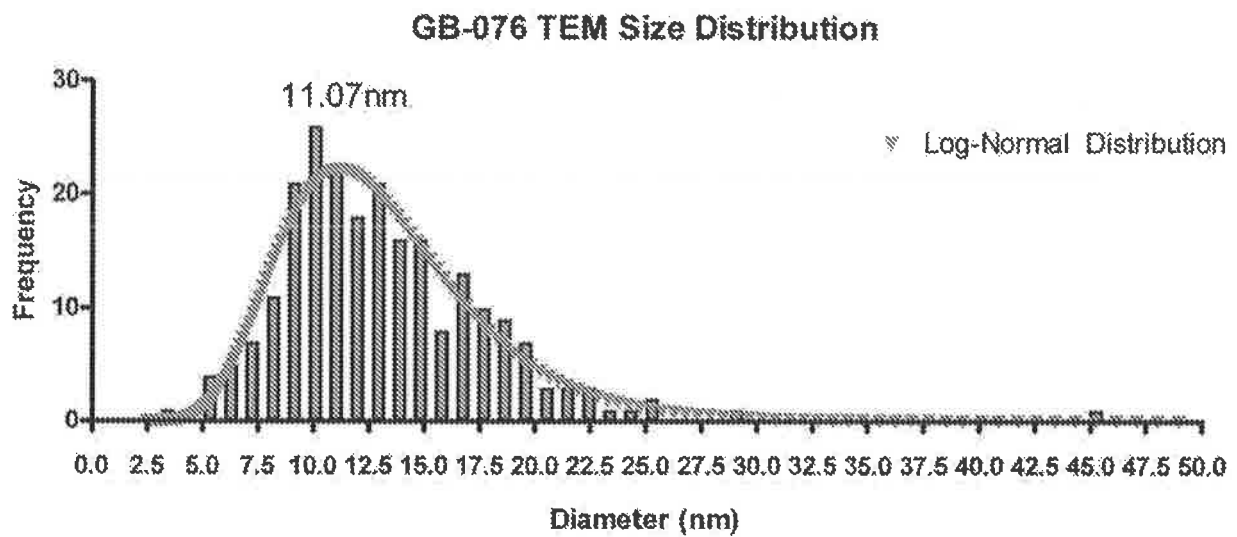


Figure 60b

Gold GB-076
63.60% transmission

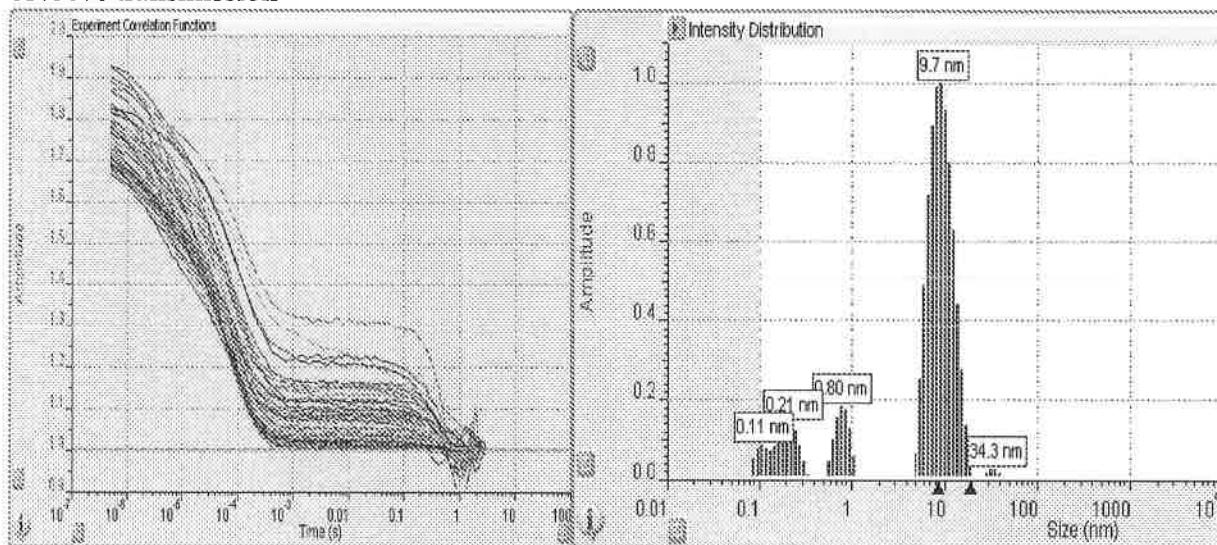
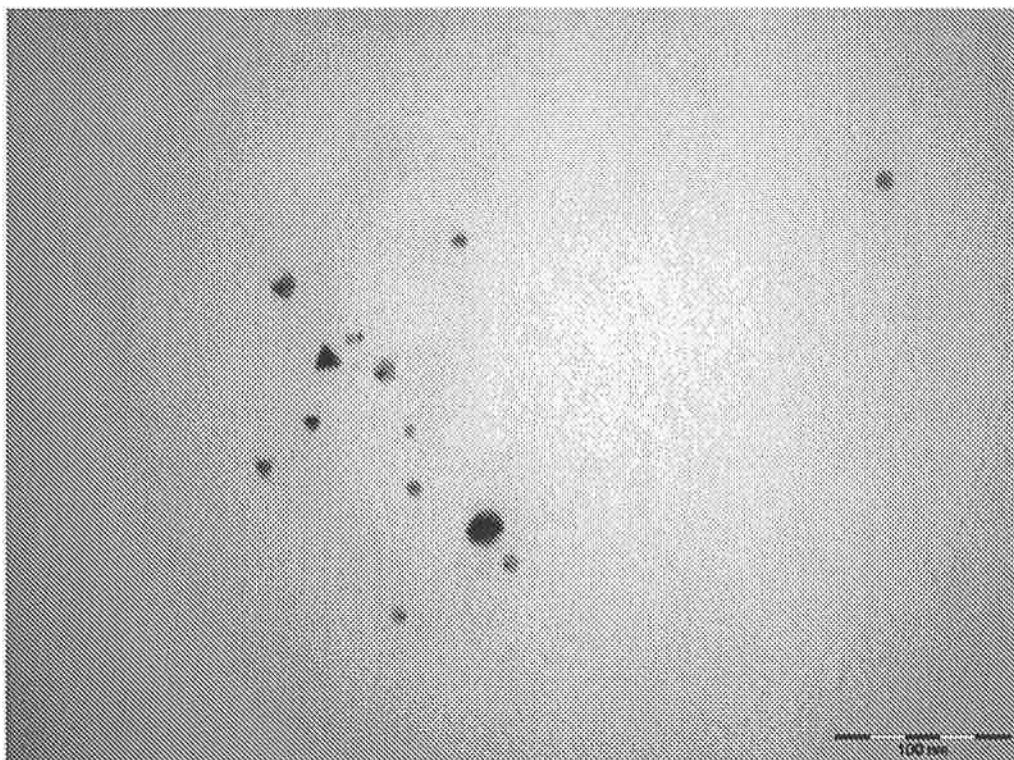
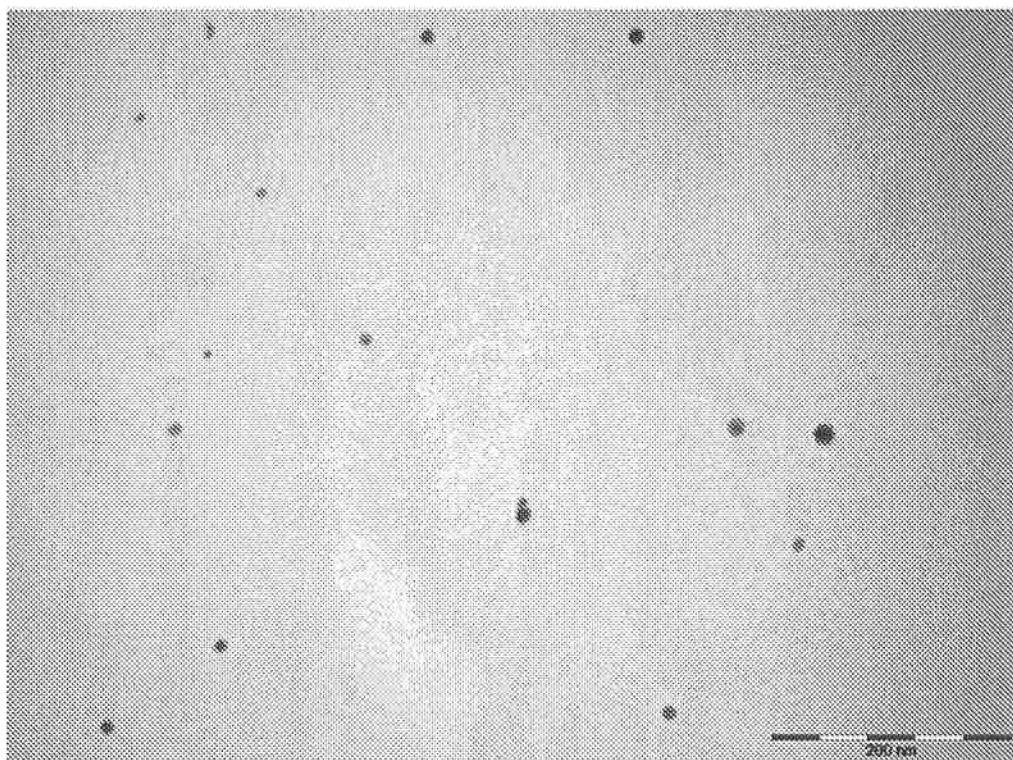


Figure 60c



a1



a2

Figure 61
GB-077

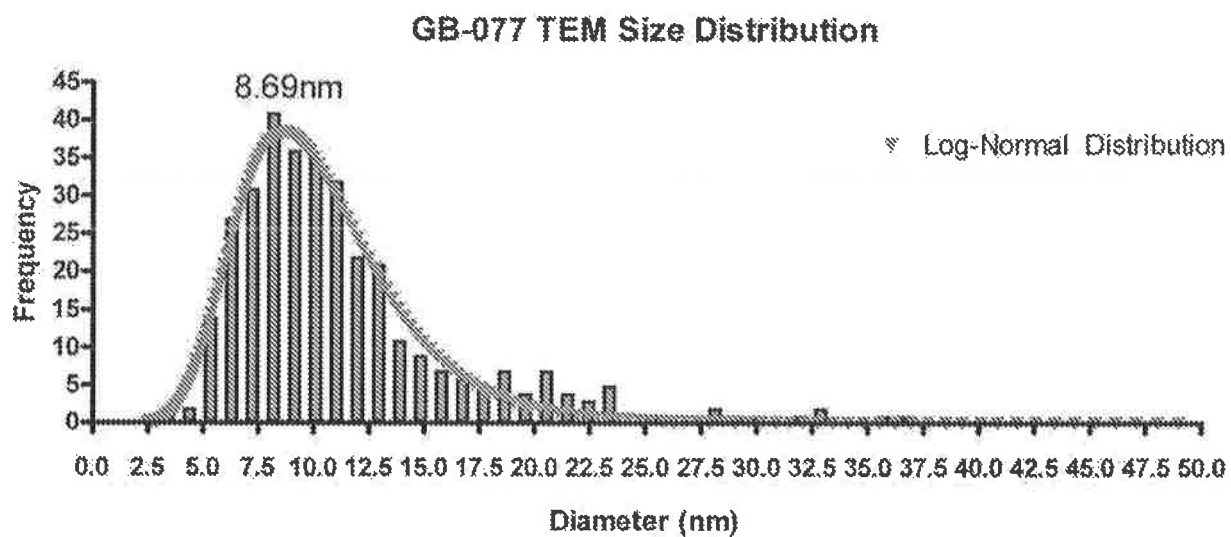


Figure 61b

Gold GB-077
20.00% transmission

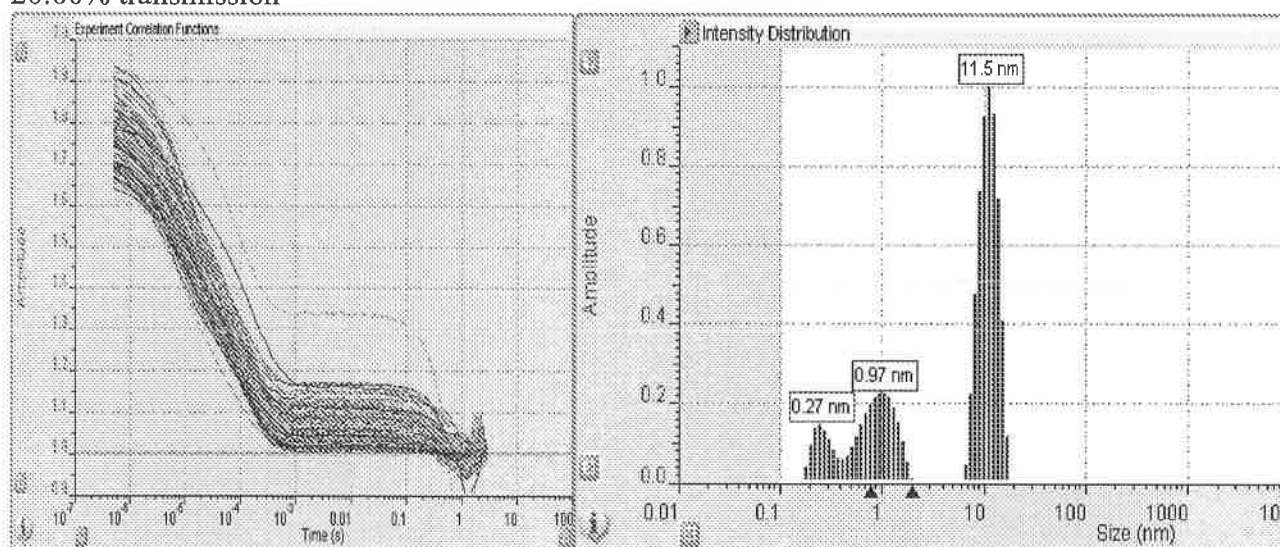
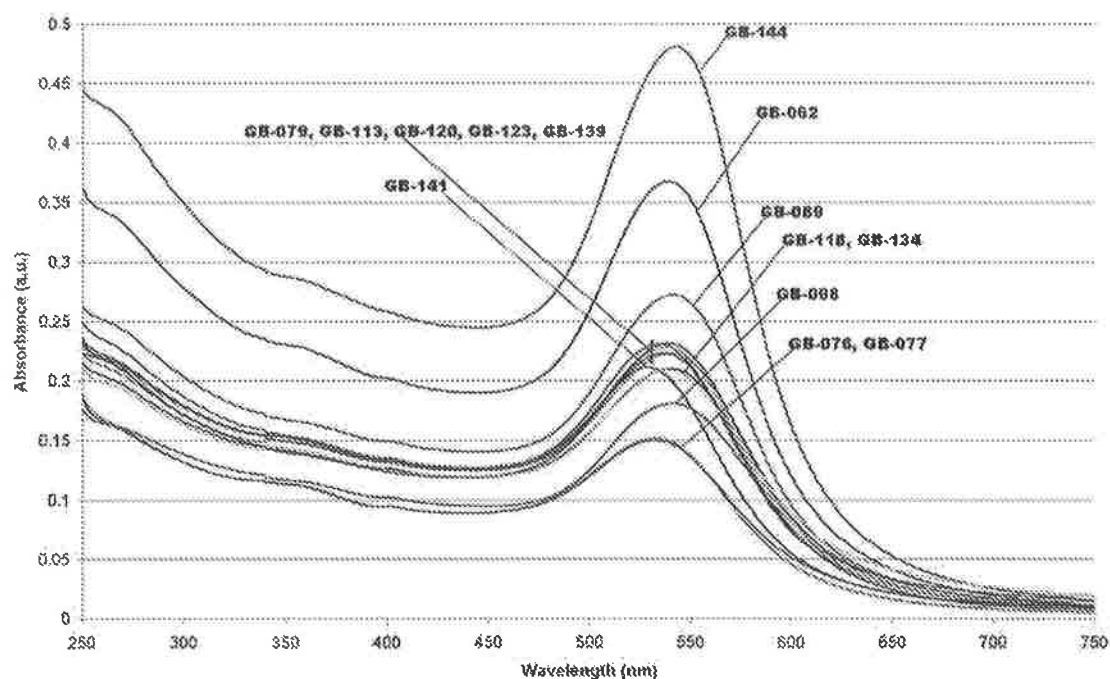
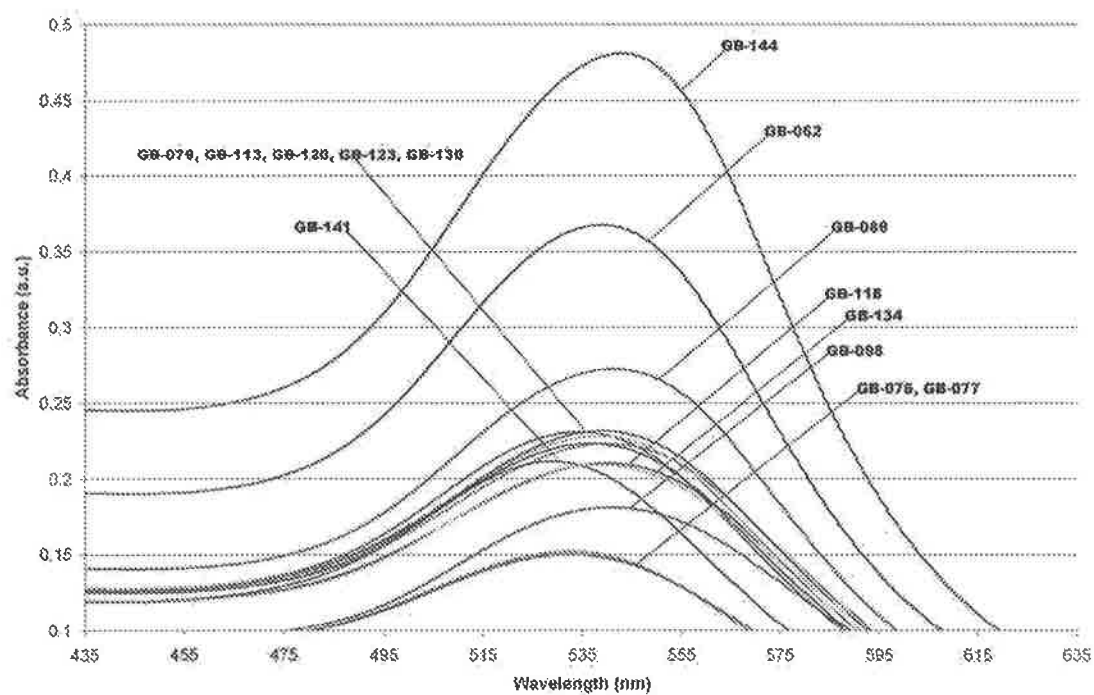


Figure 61c

Example 16, UV-Vis GB-Series, $\lambda = 250\text{nm}-750\text{nm}$ **Figure 61d****Example 16, UV-Vis GB-Series $\lambda = 435\text{nm}-635\text{nm}$** **Figure 61e**

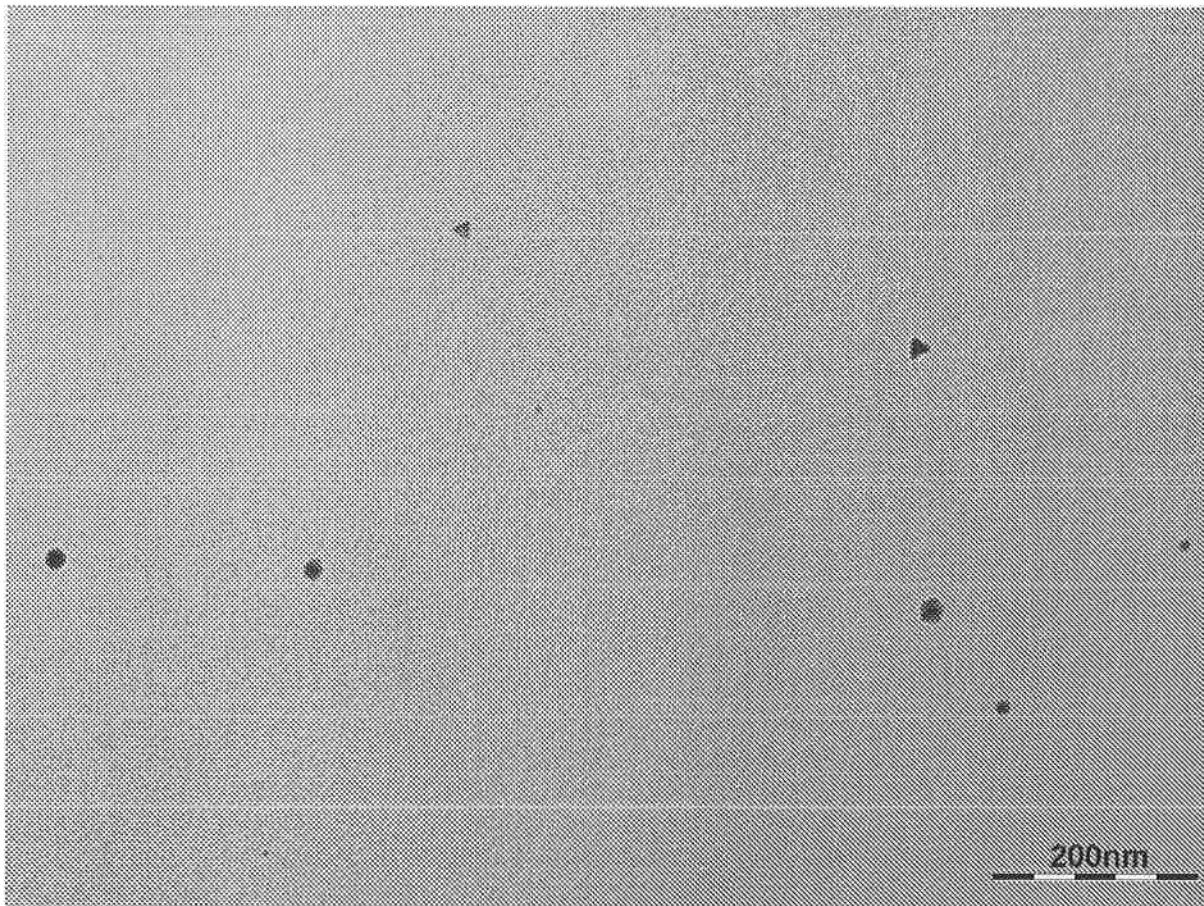
GB-151

Figure 62a

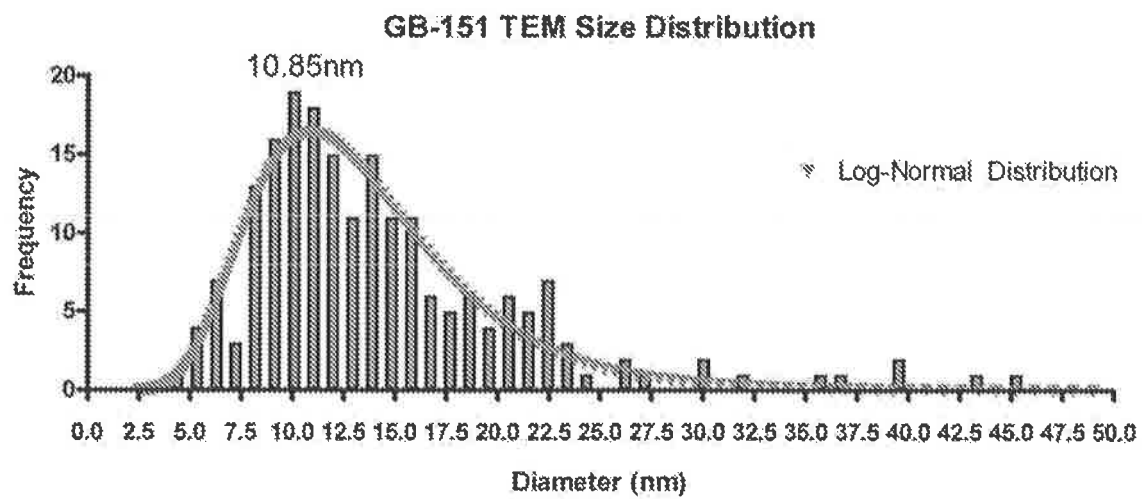


Figure 62b

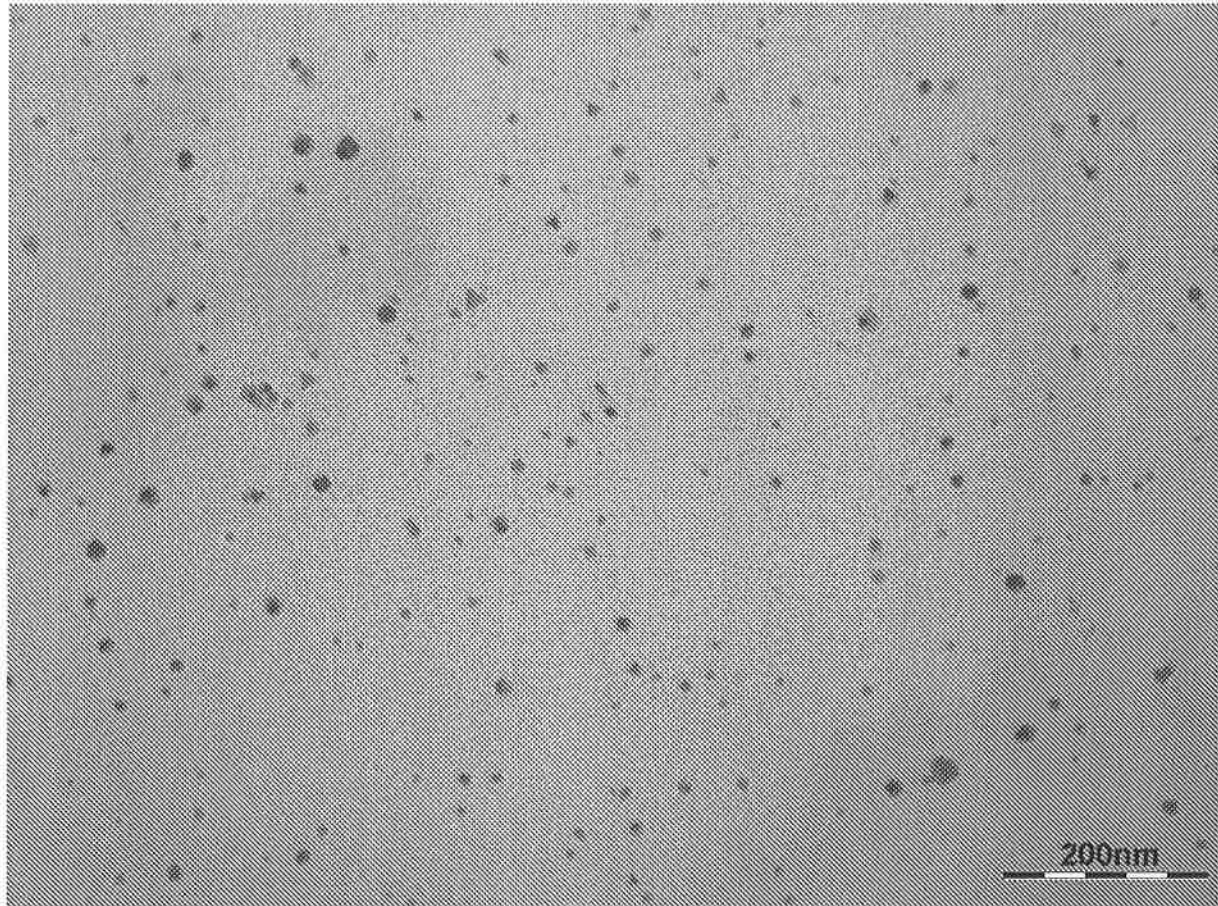
GB-188

Figure 63a

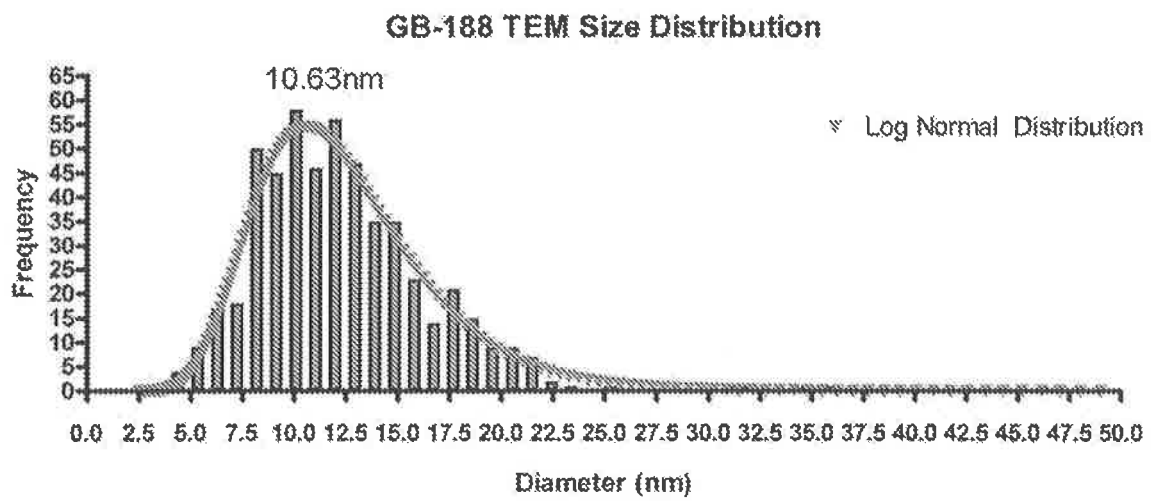


Figure 63b

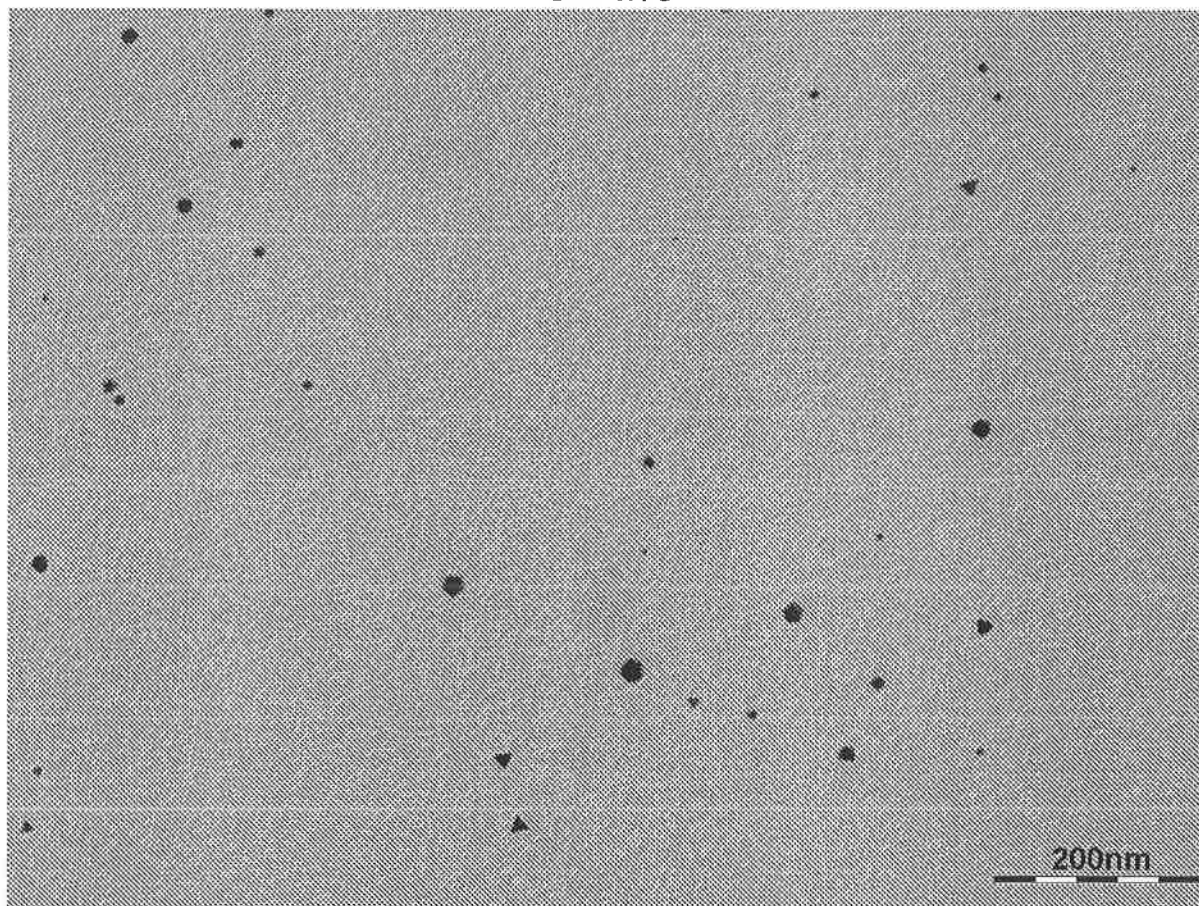
GB-175

Figure 64a

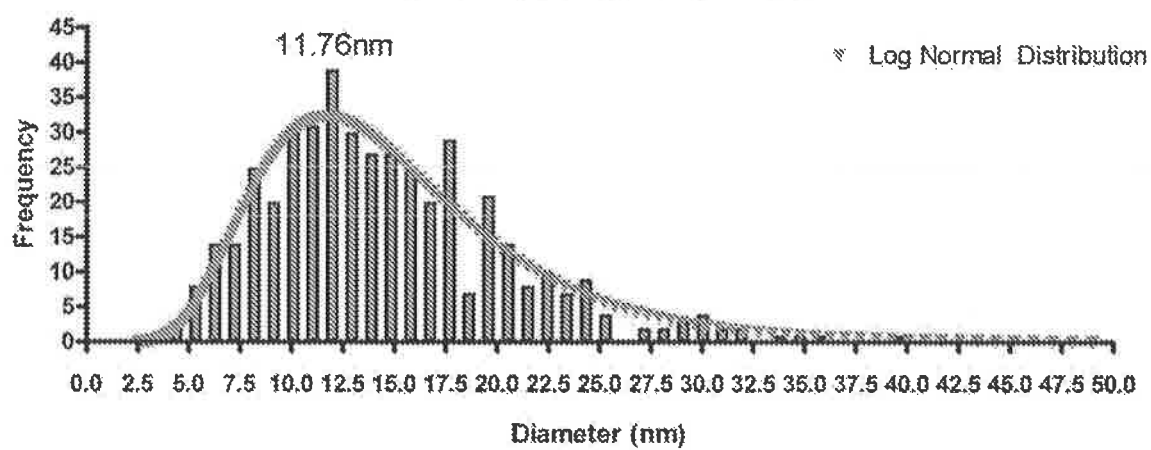
GB-175 TEM Size Distribution

Figure 64b

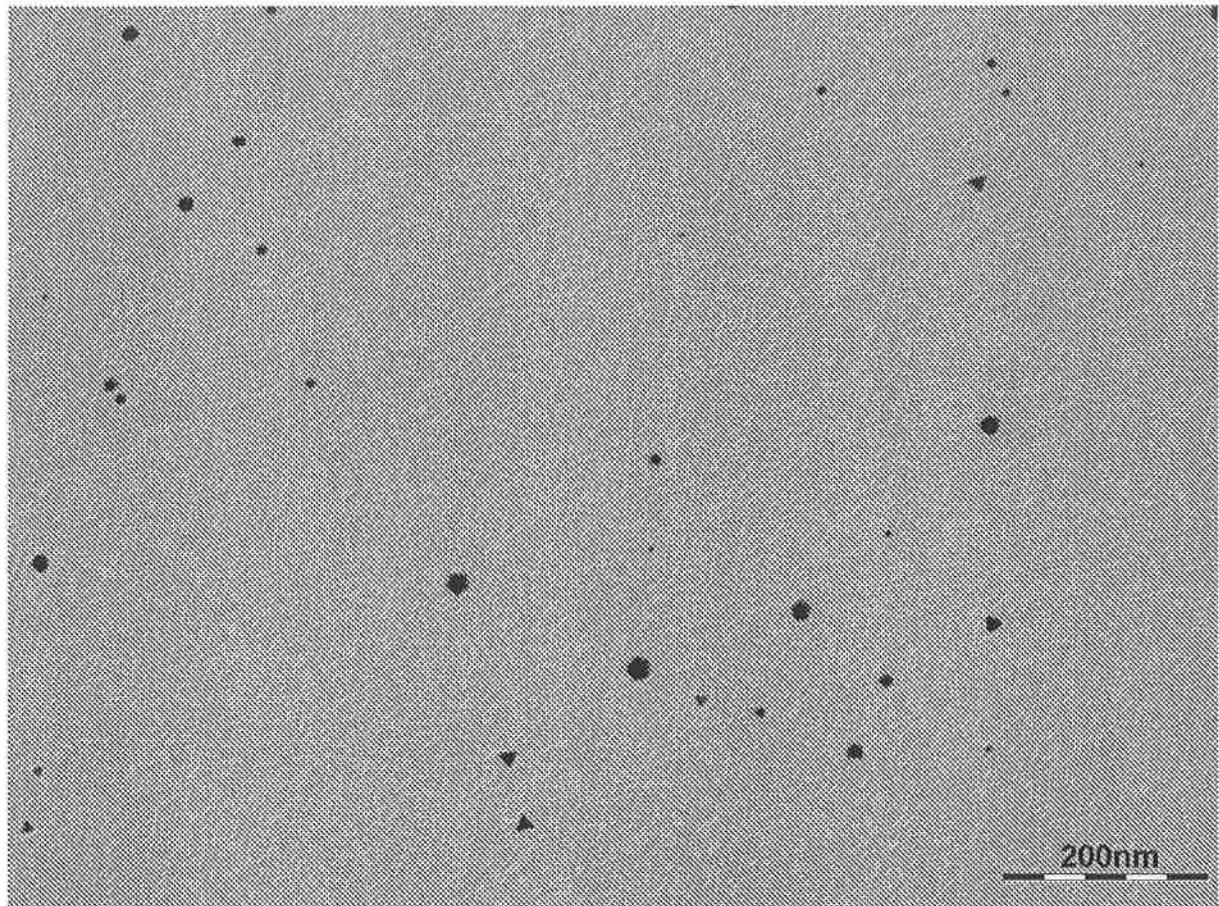
GB-177

Figure 65a

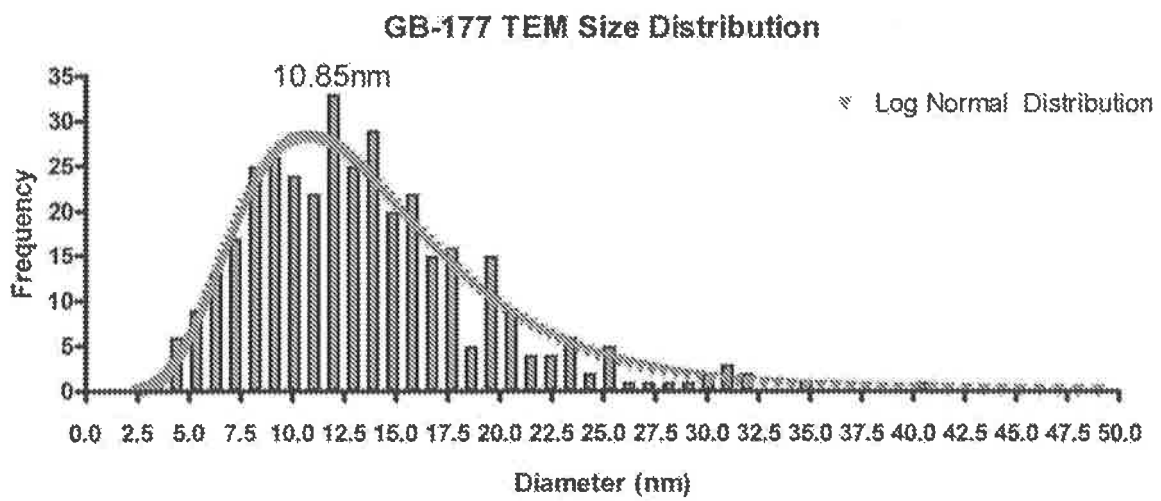


Figure 65b

GB-176

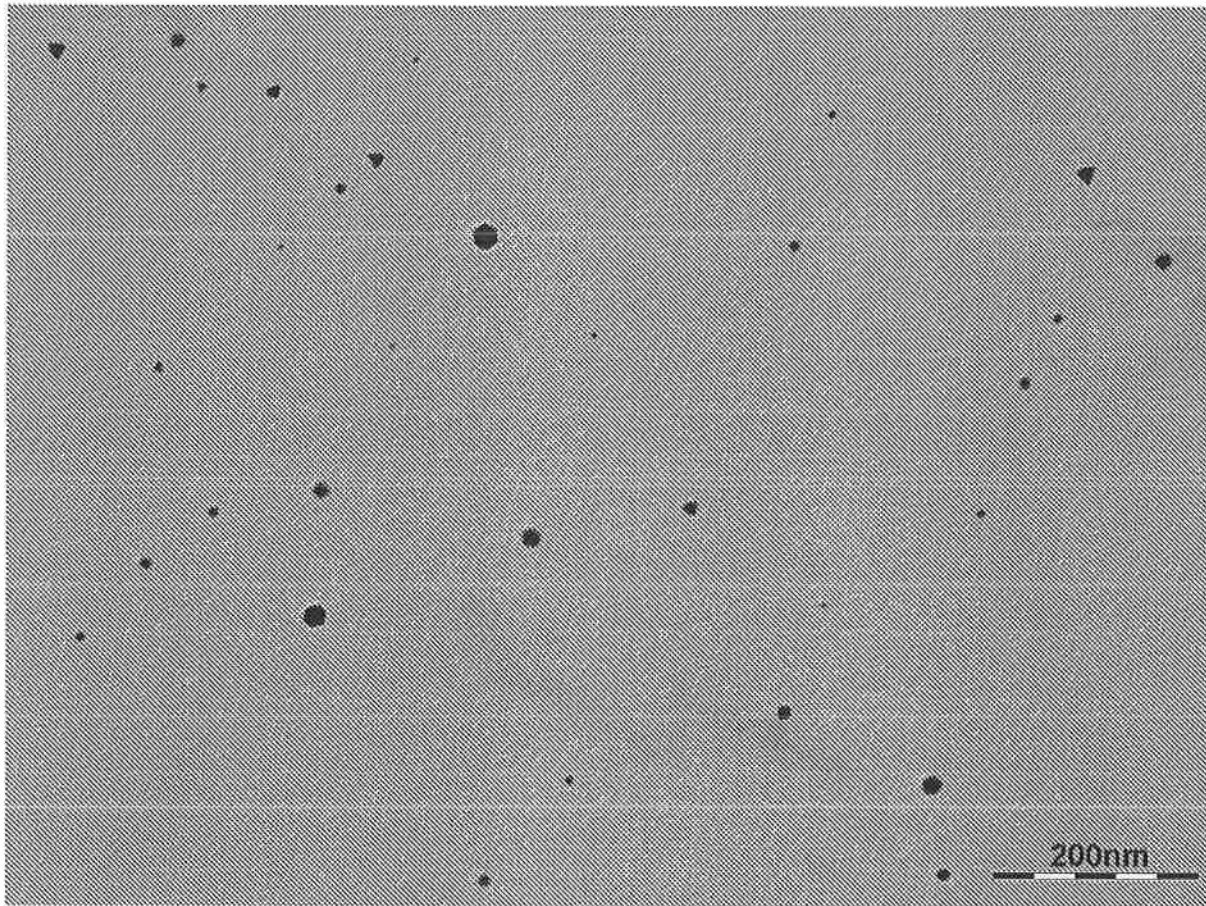


Figure 66a

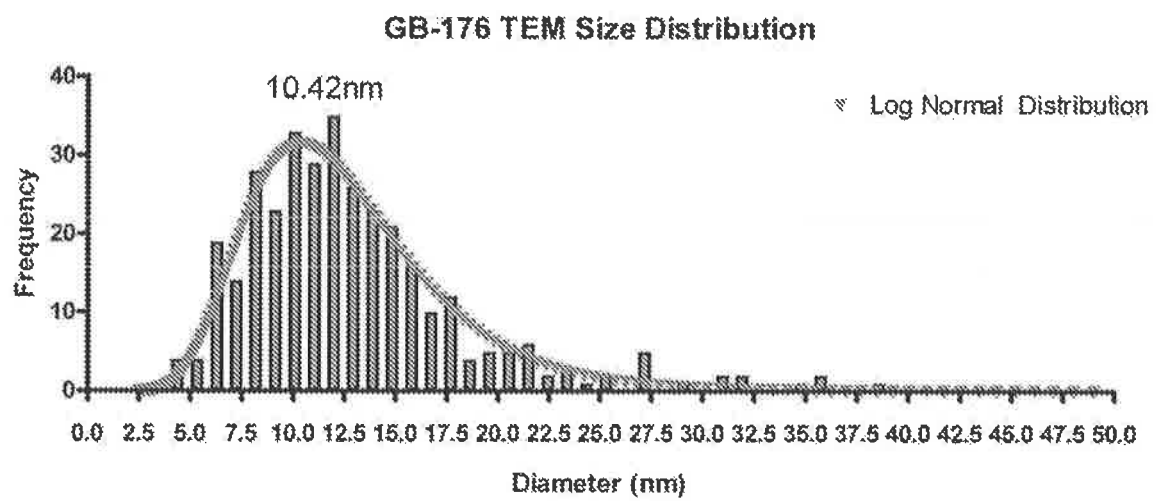


Figure 66b

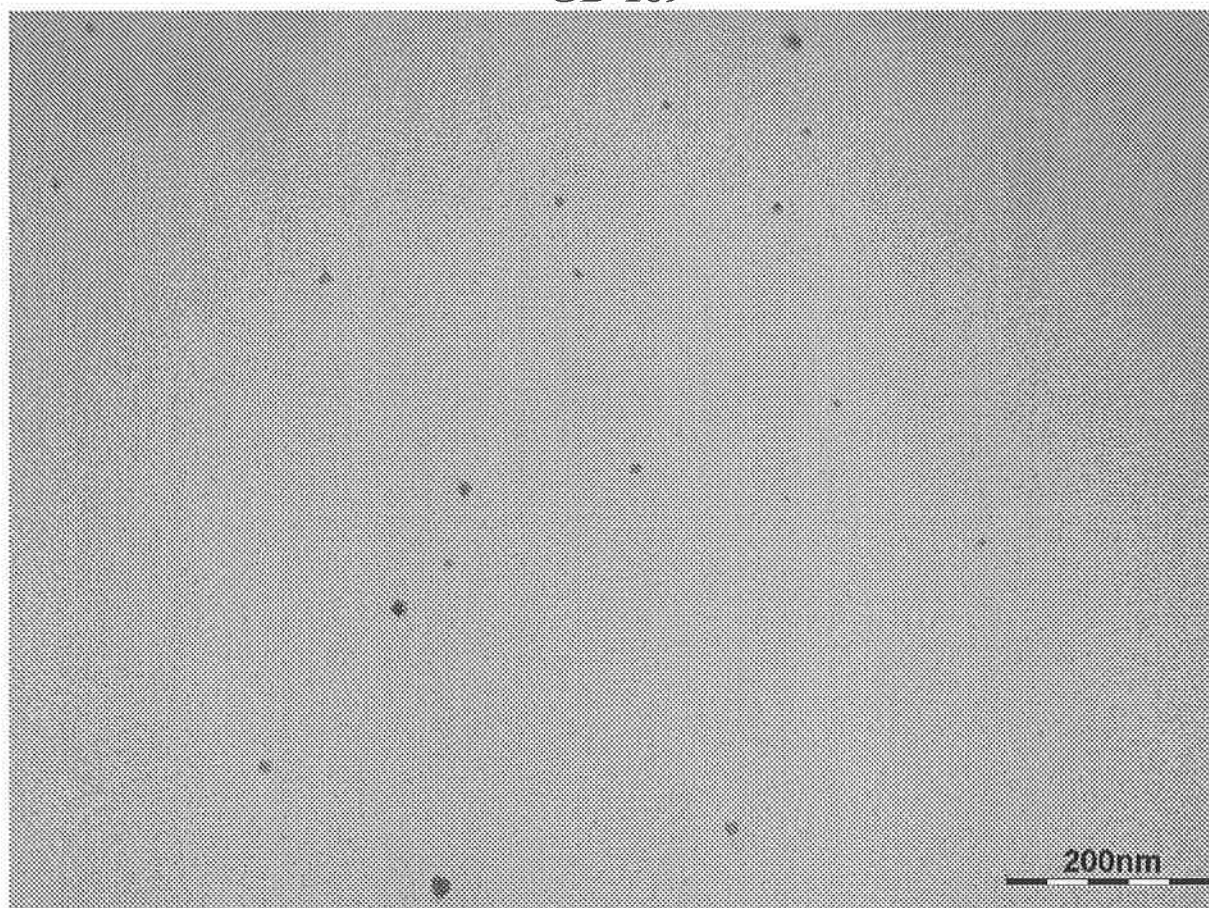
GB-189

Figure 67a

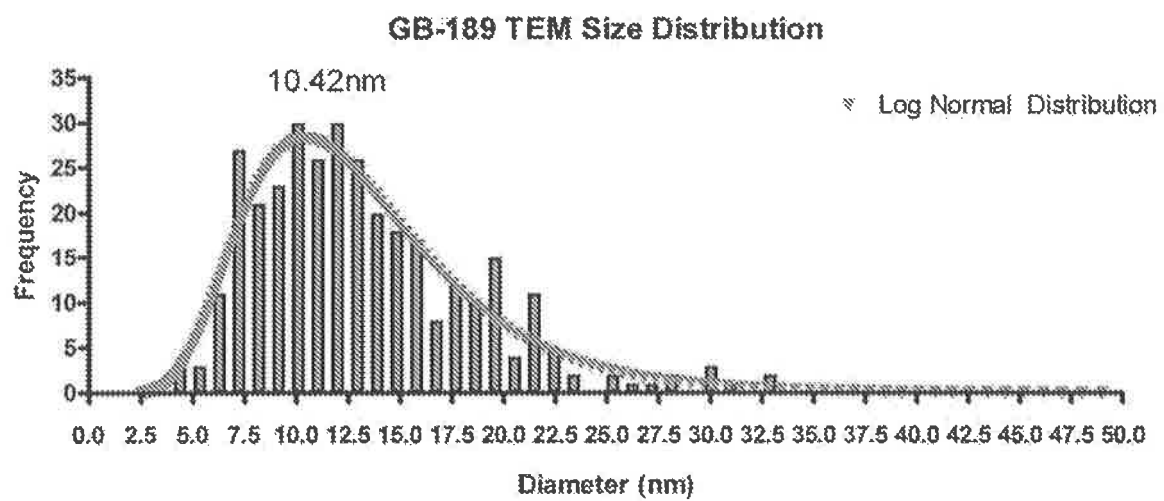


Figure 67b

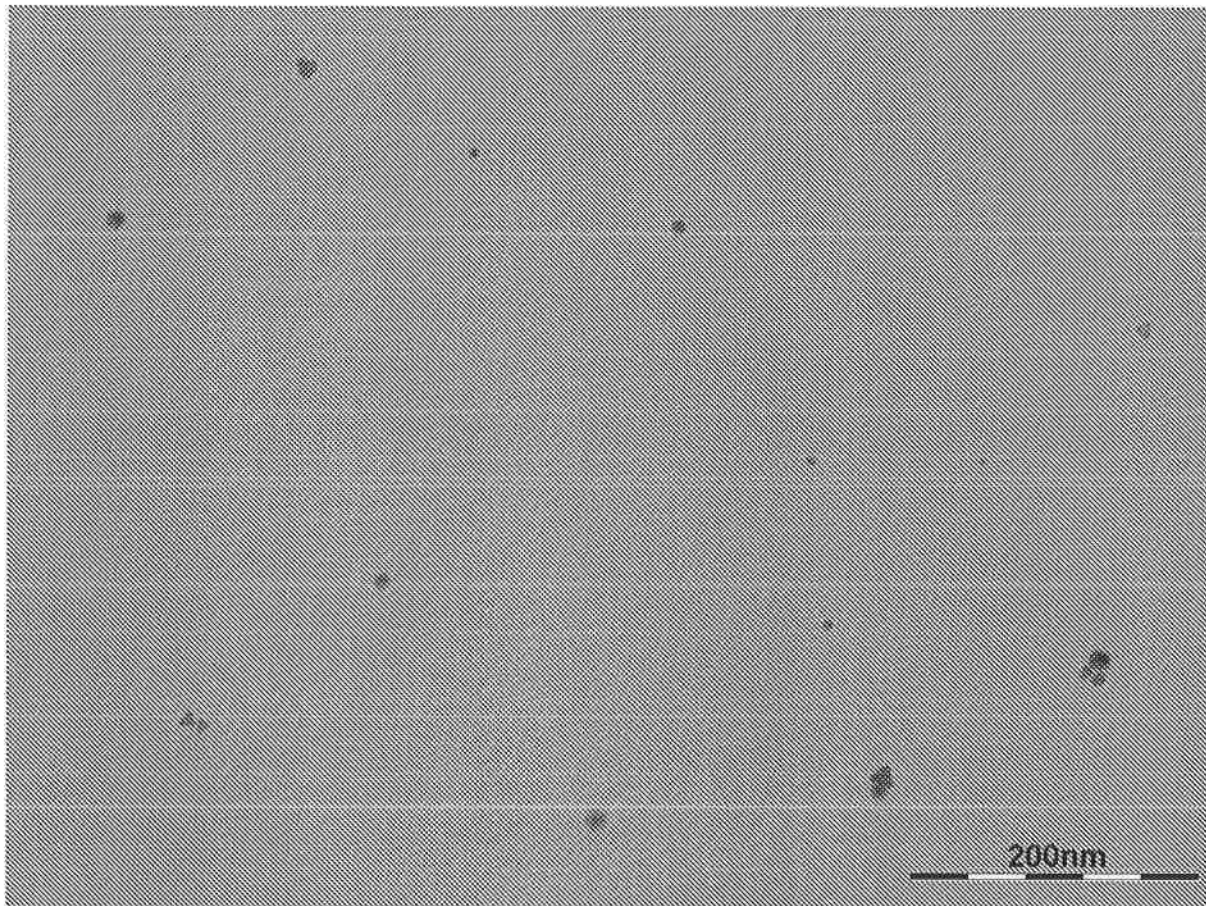
GB-194

Figure 68a

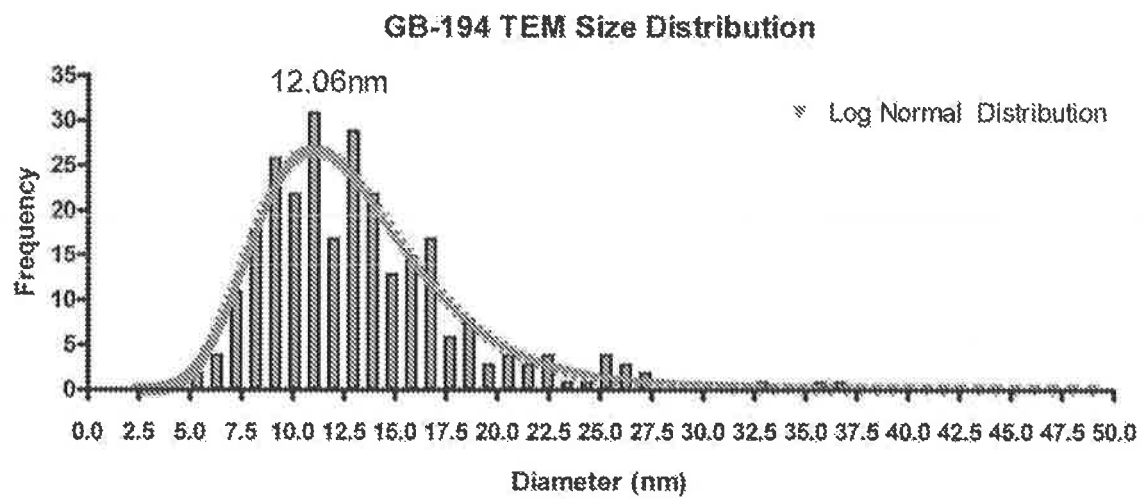


Figure 68b

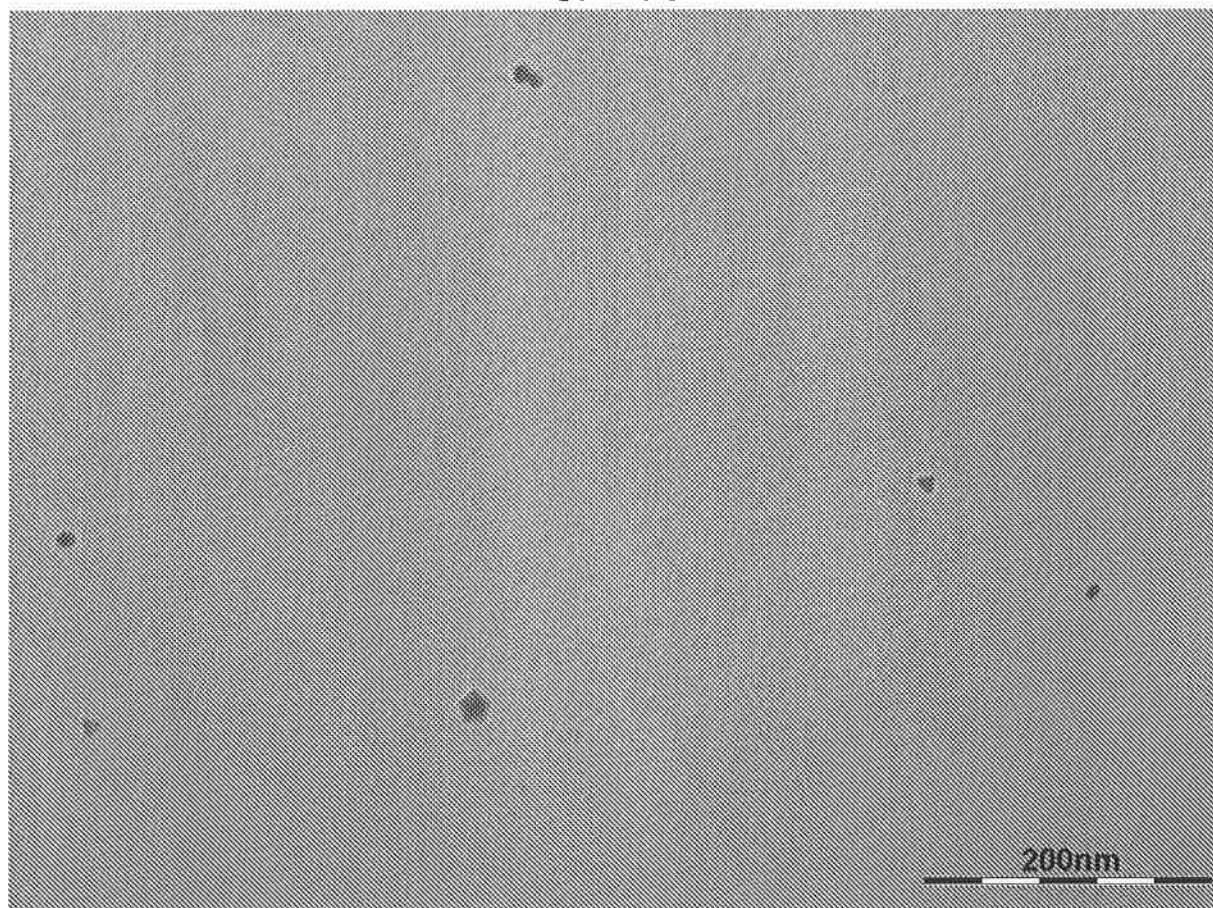
GB-195

Figure 69a

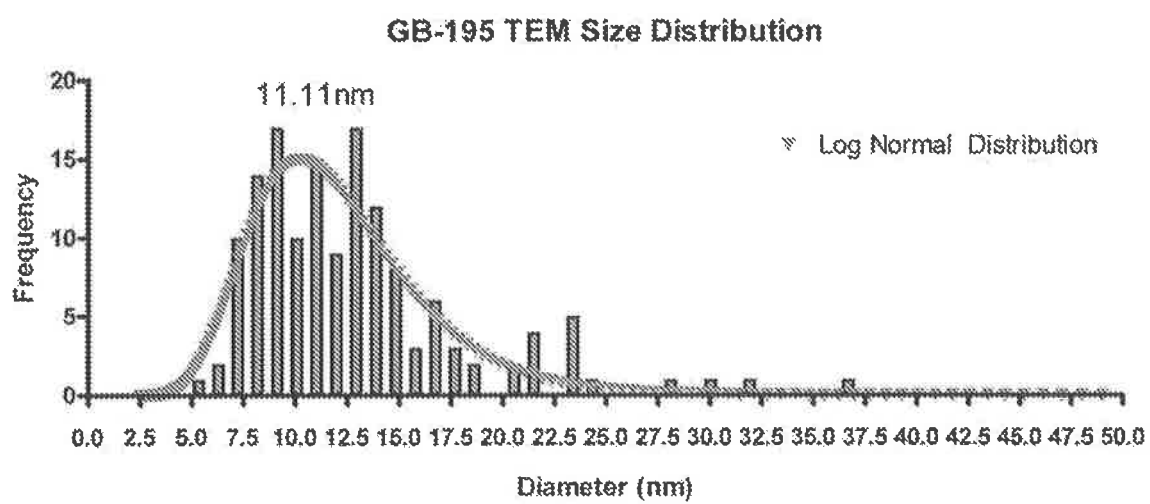


Figure 69b

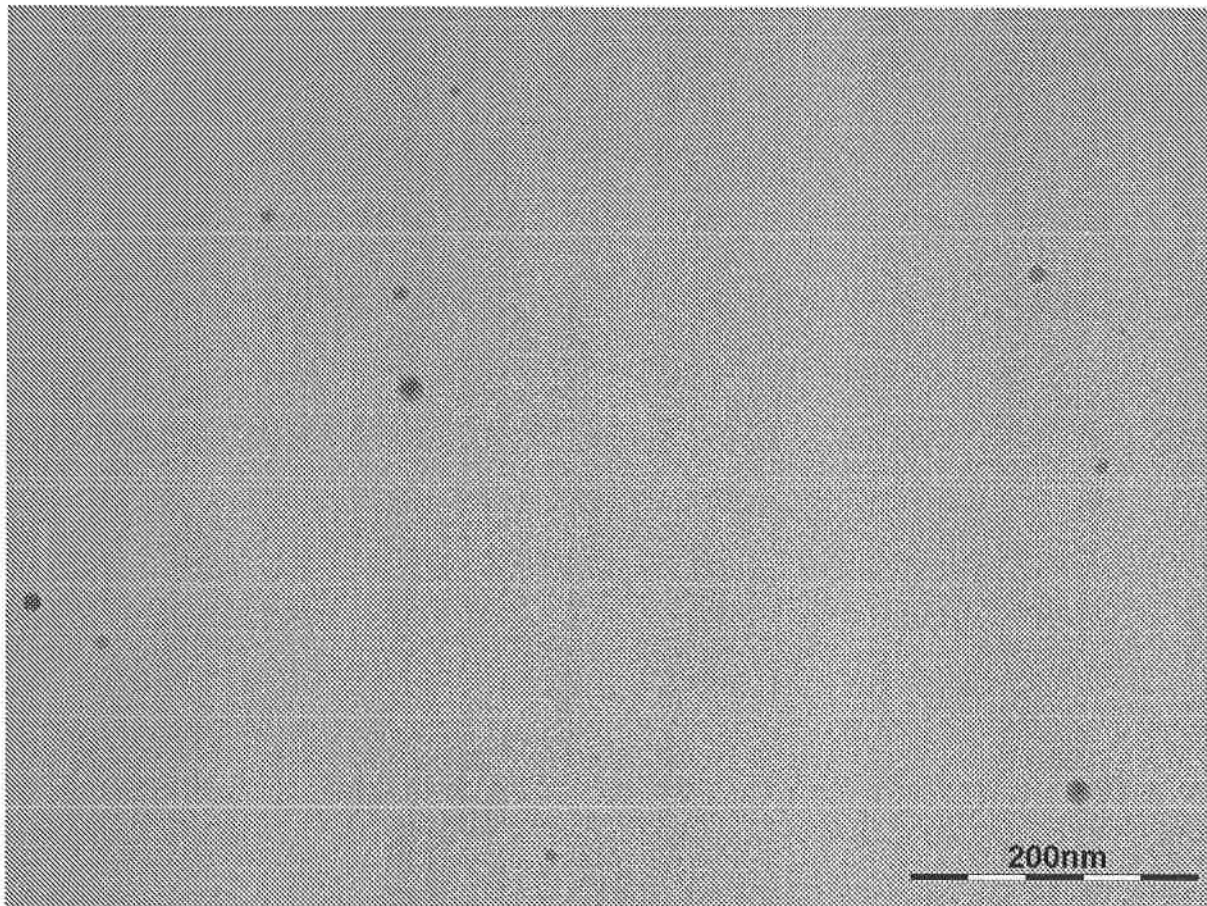
GB-196

Figure 70a

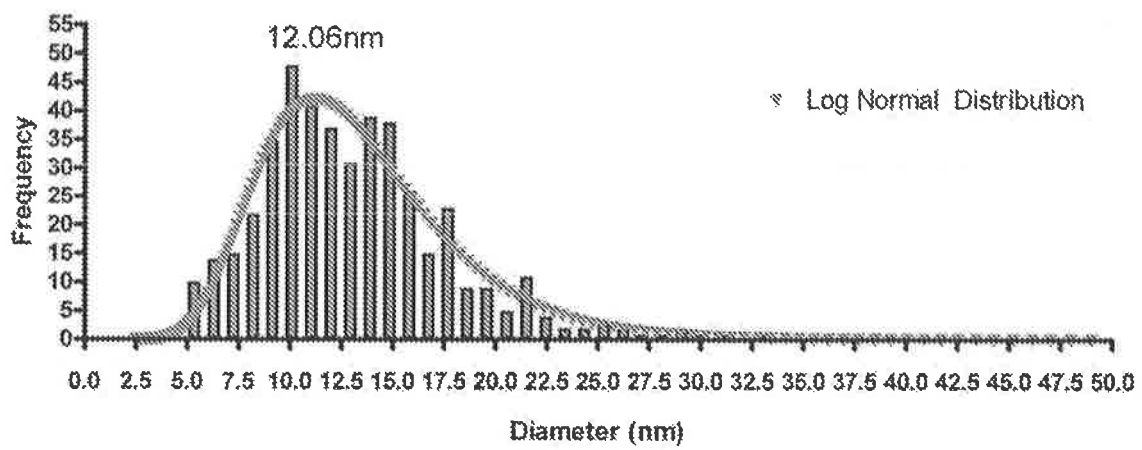
GB-196 TEM Size Distribution

Figure 70b

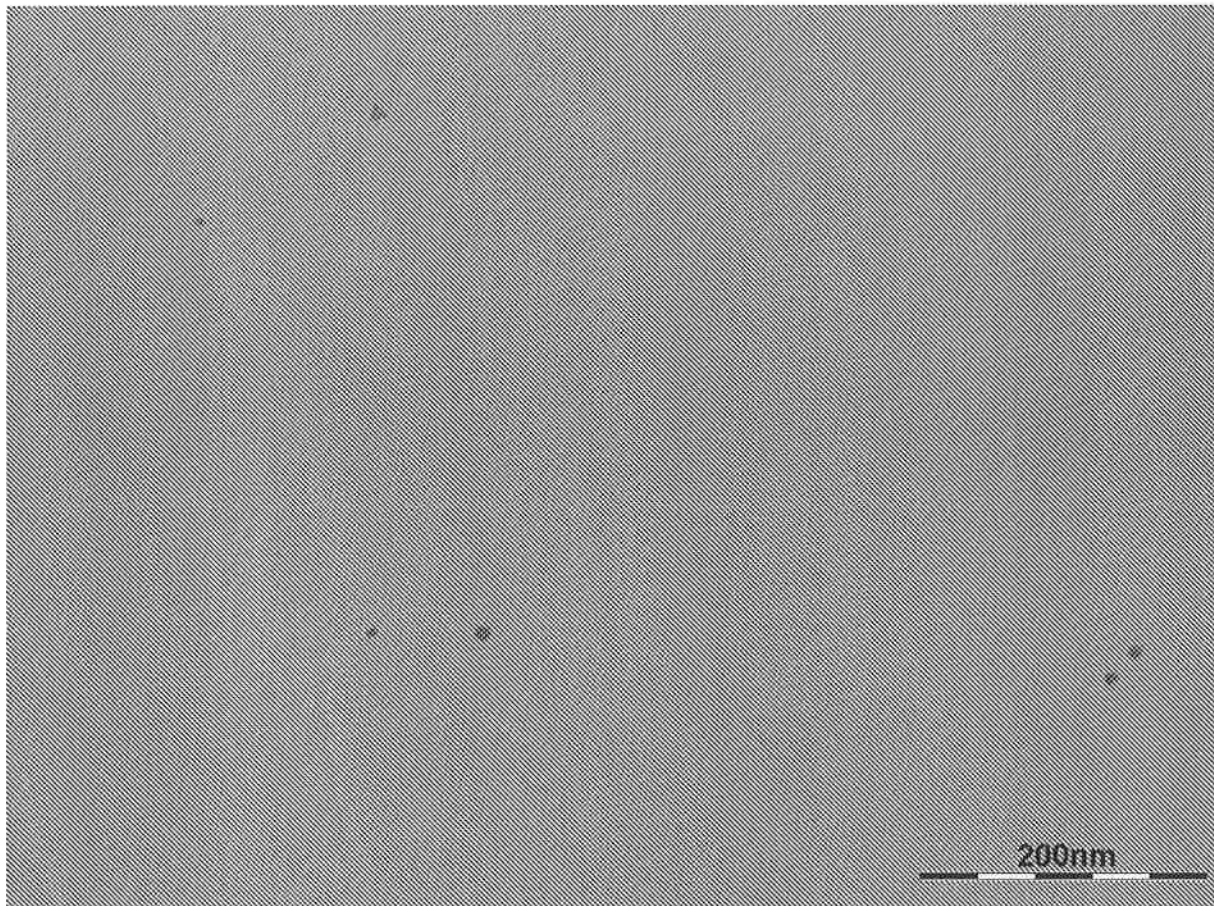
GB-198

Figure 71a

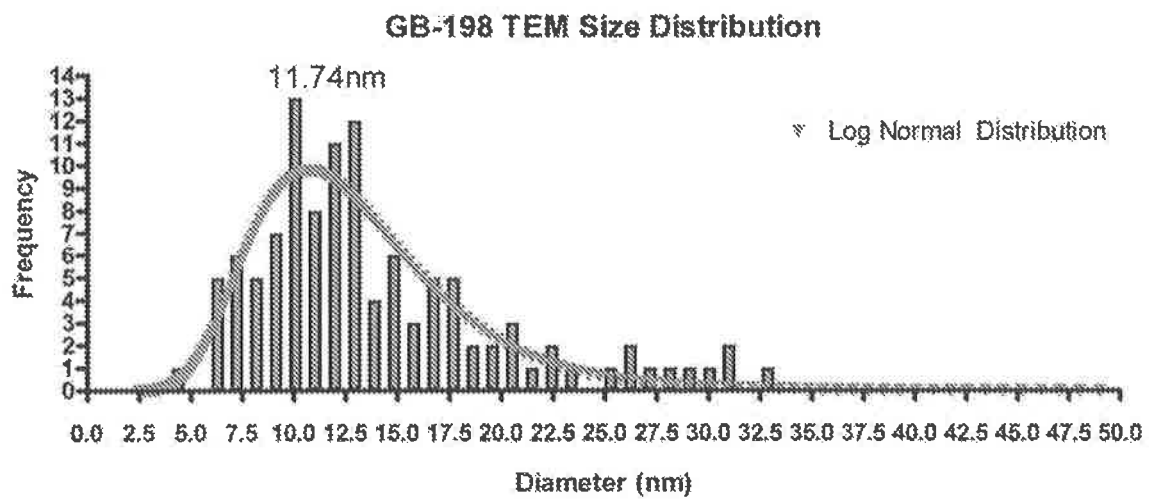


Figure 71b

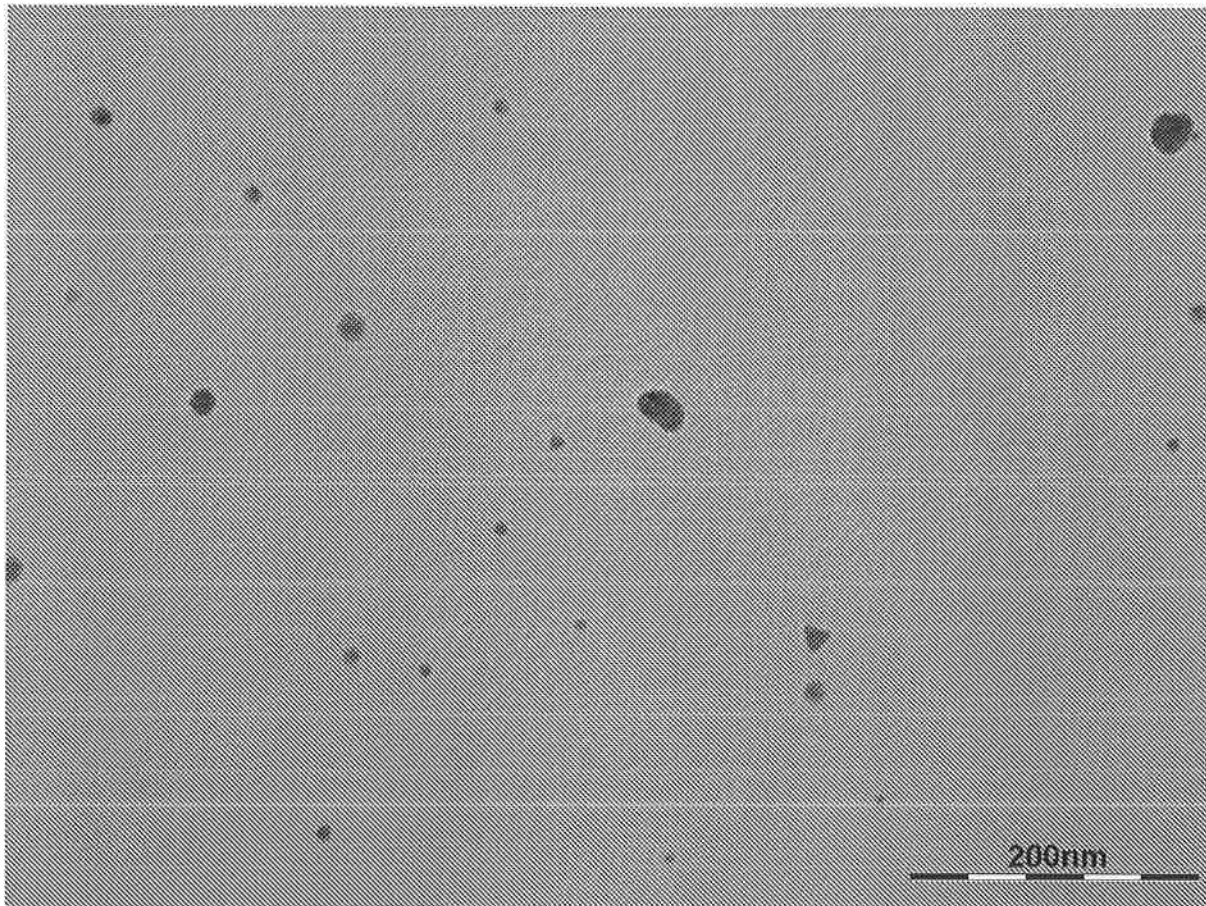
GB-199

Figure 72a

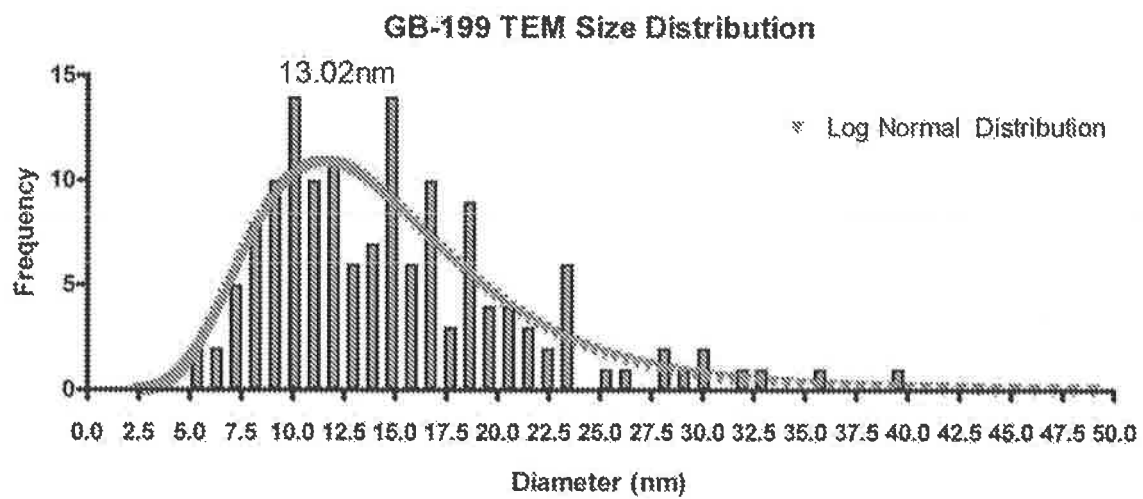
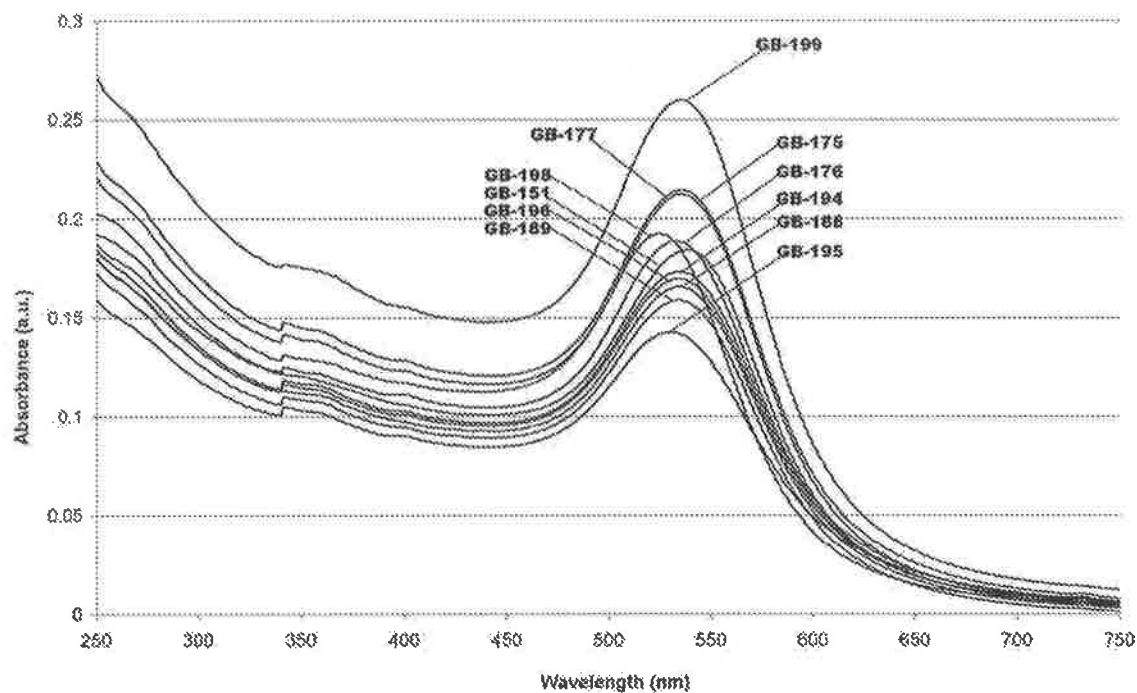
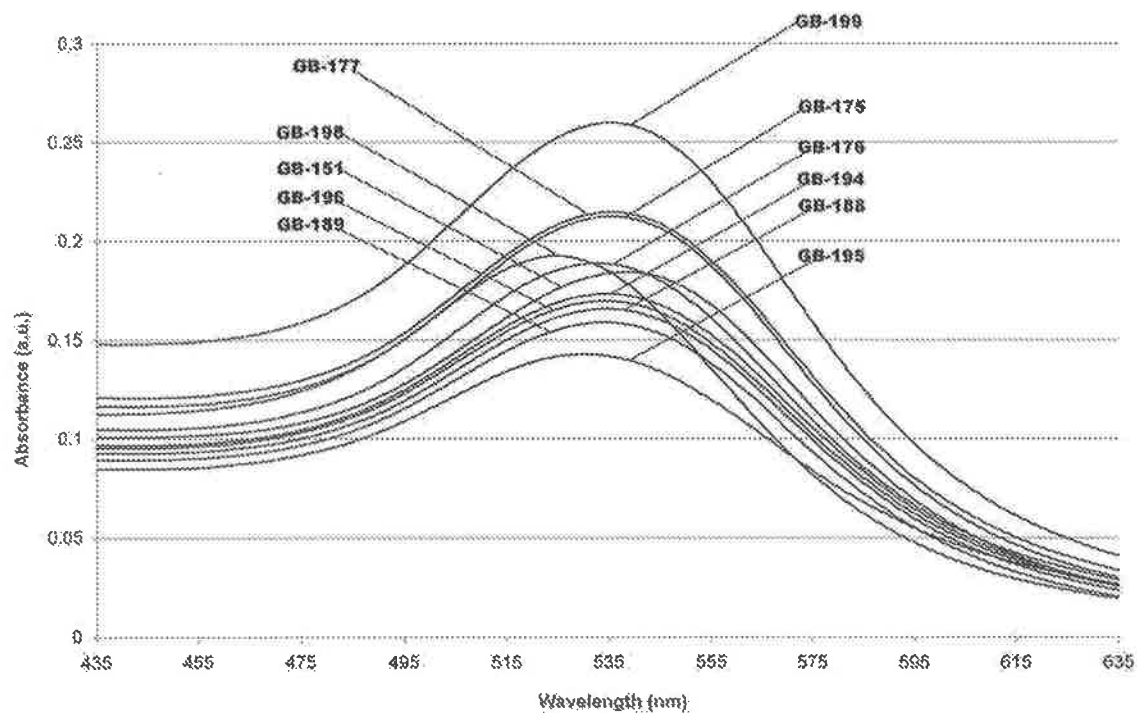
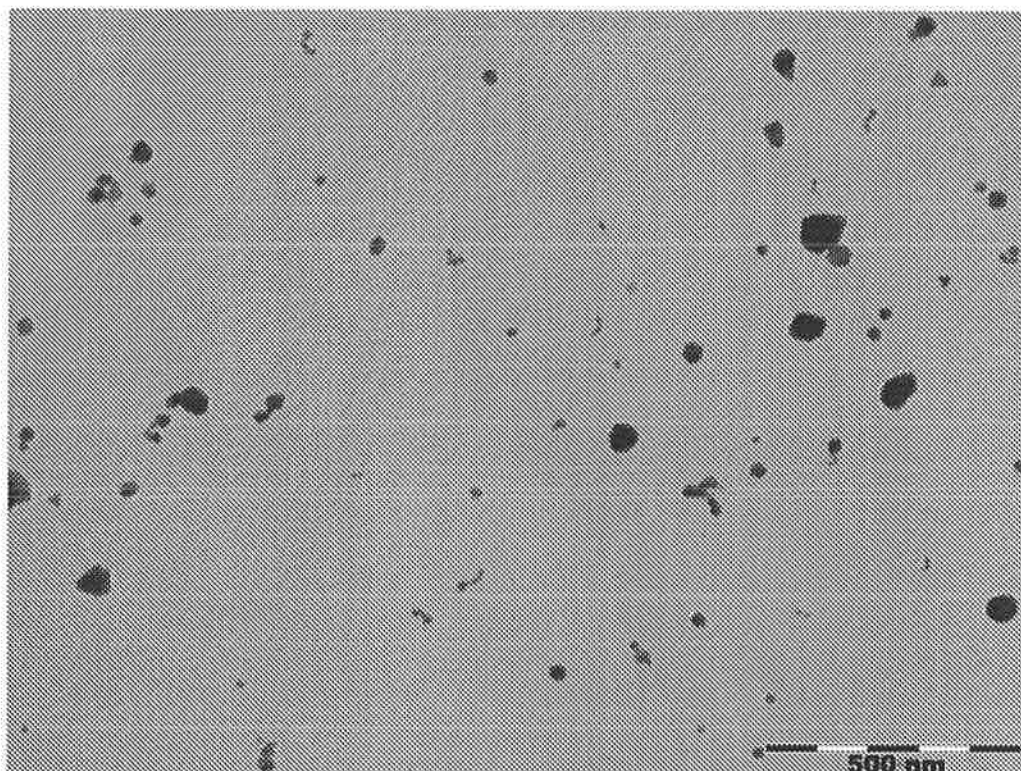
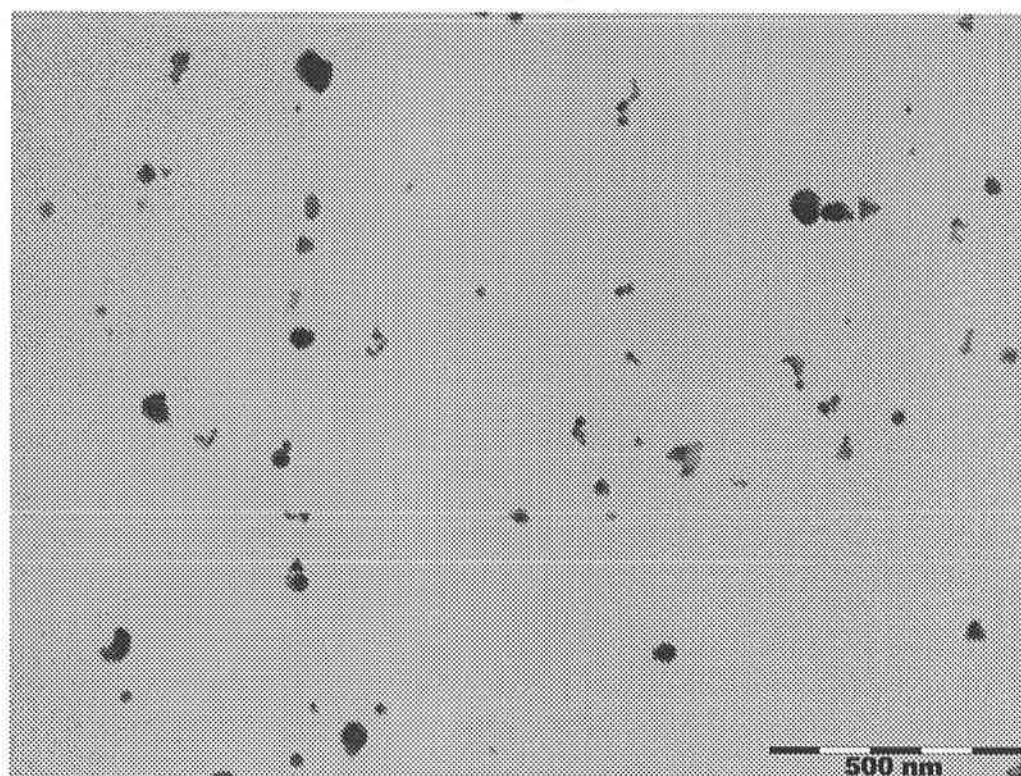


Figure 72b

Example 18, UV-vis GB Series, $\lambda = 250\text{nm}-750\text{nm}$ **Figure 72c****Example 18, UV-vis GB Series, $\lambda = 435\text{nm}-635\text{nm}$** **Figure 72d**



a1



a2

Figure 73
Aurora-020

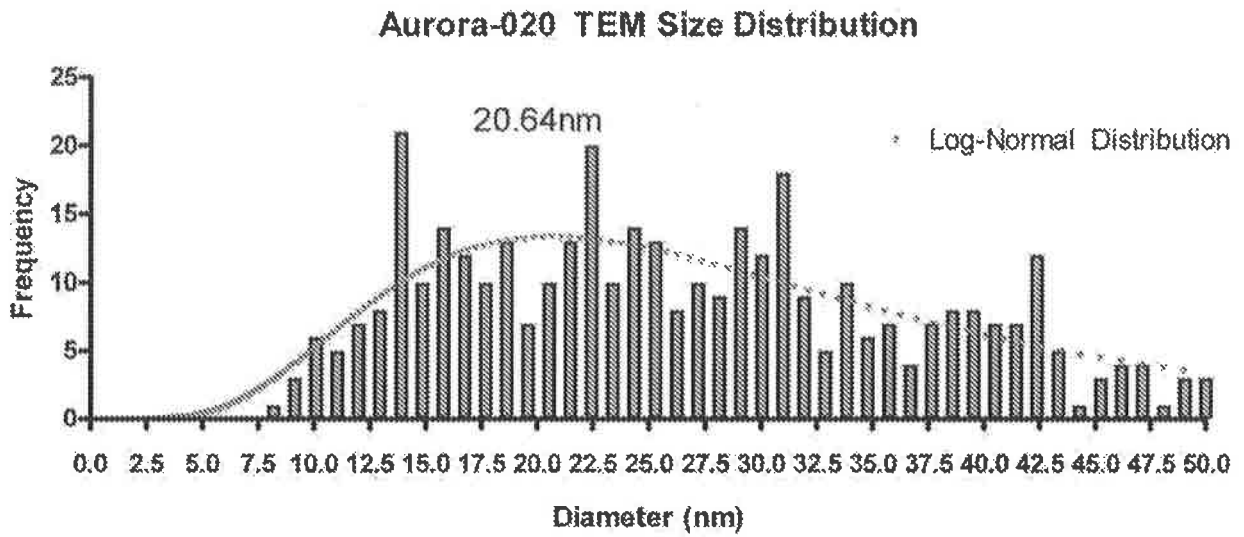


Figure 73b

Gold Aurora-020
0.07% transmission

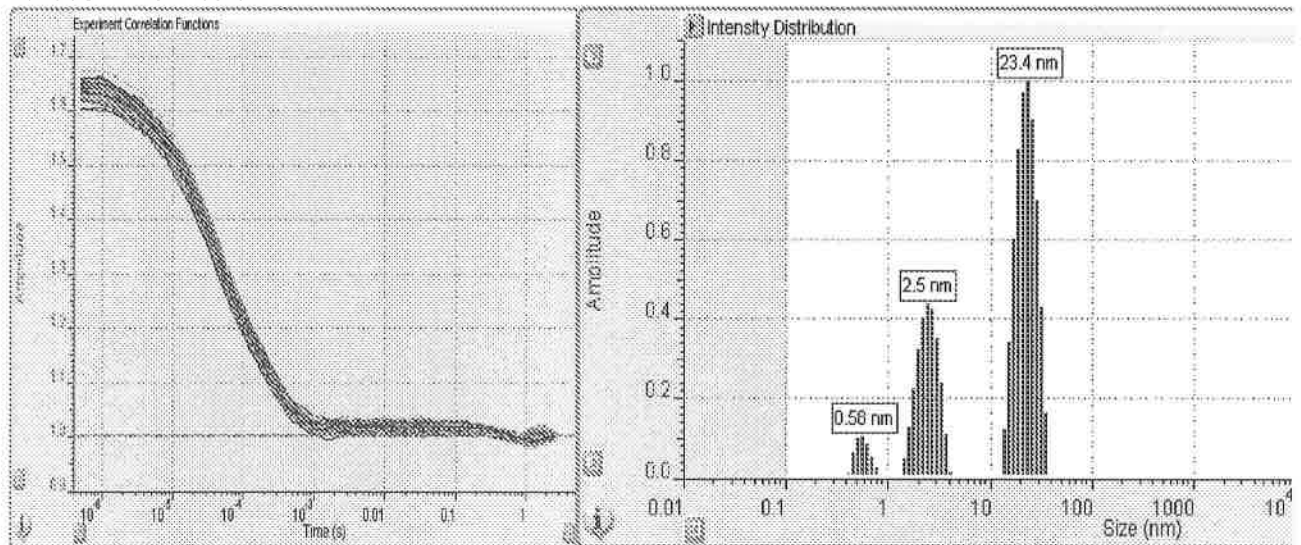
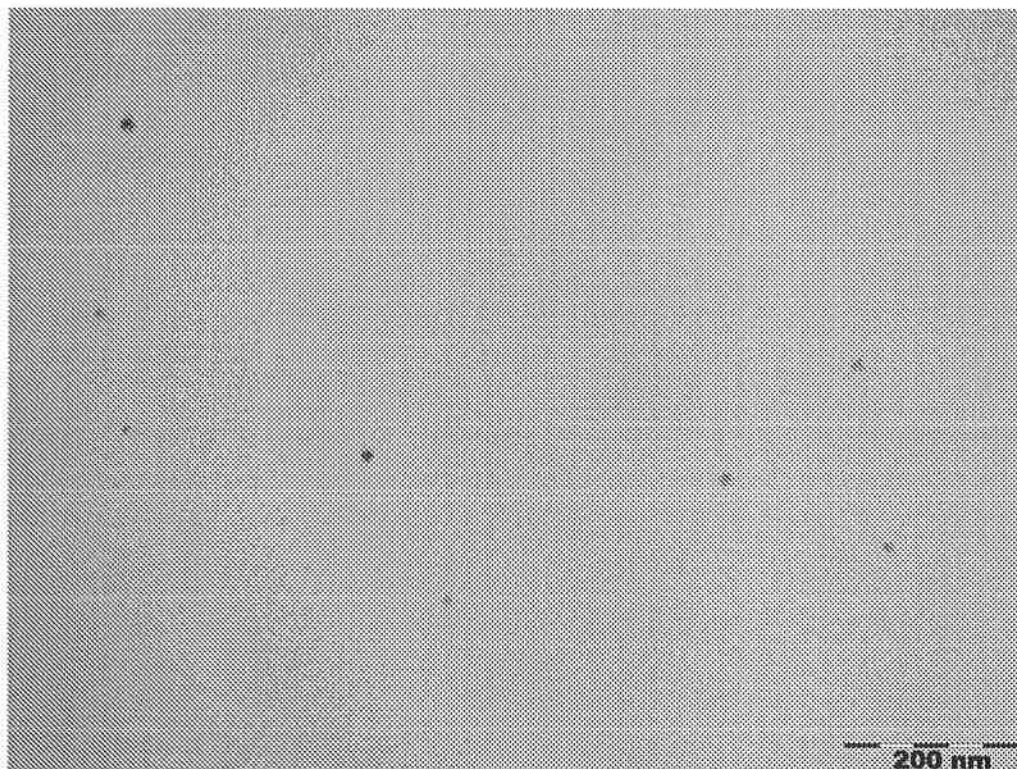
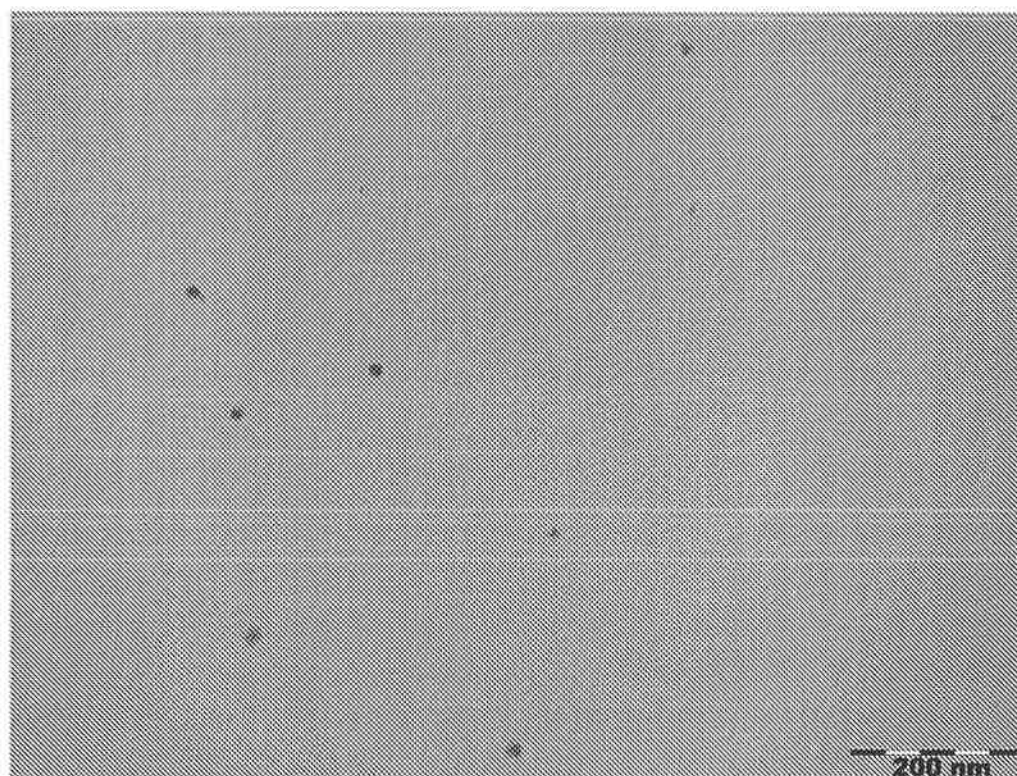


Figure 73c



a1



a2

Figure 74
GA-002

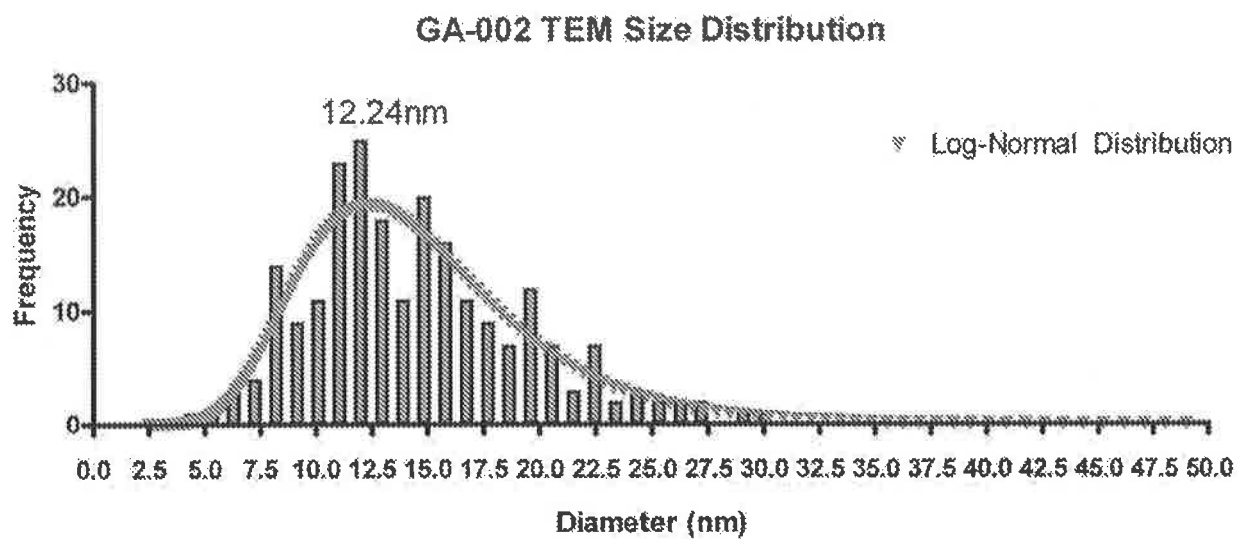


Figure 74b

Gold GA-002
16.56% transmission

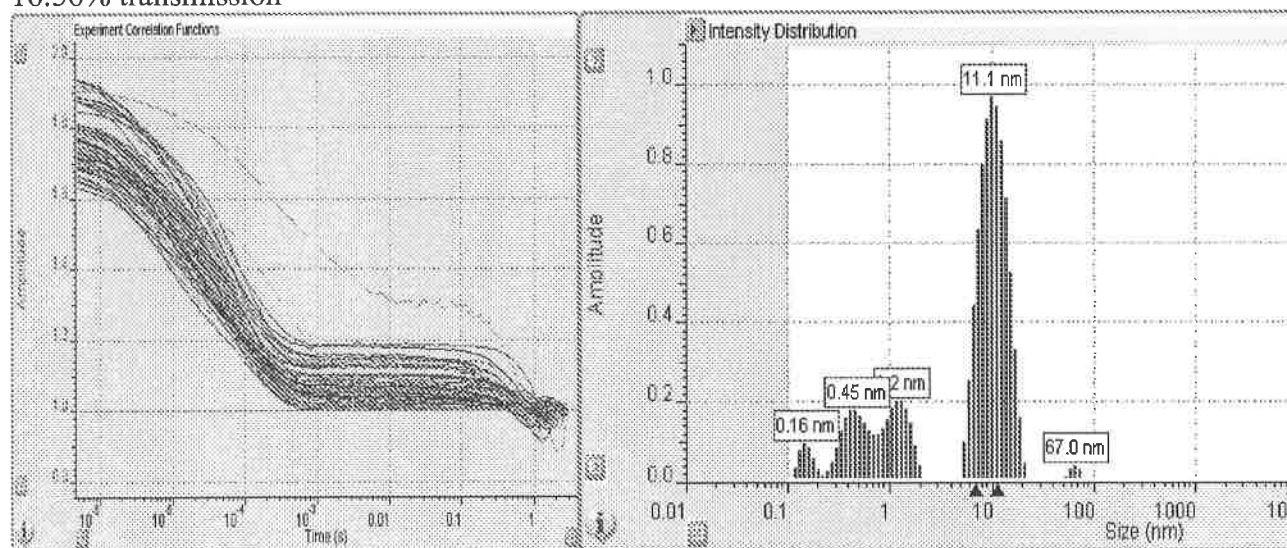
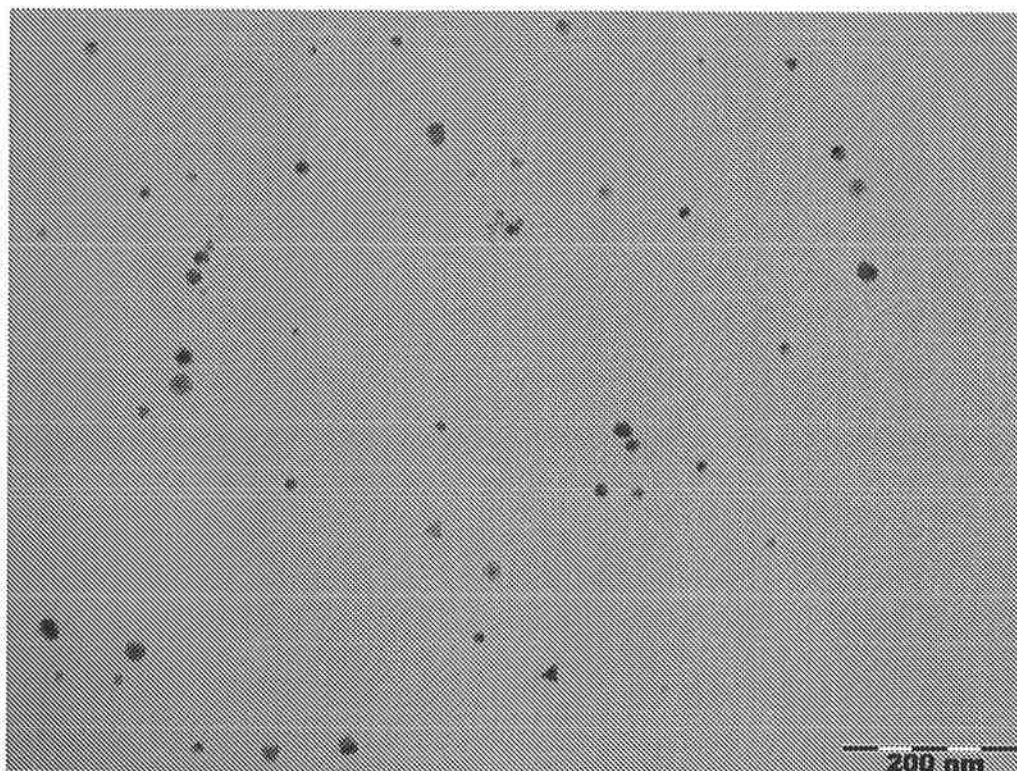
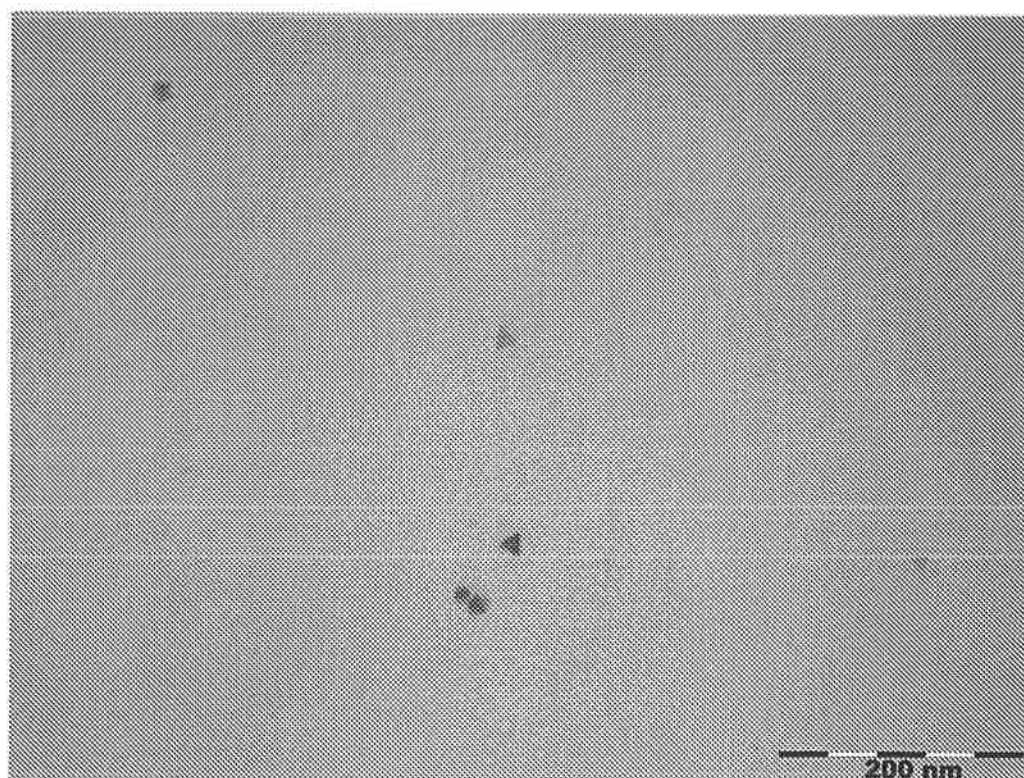


Figure 74c



a1



a2

Figure 75
GA-003

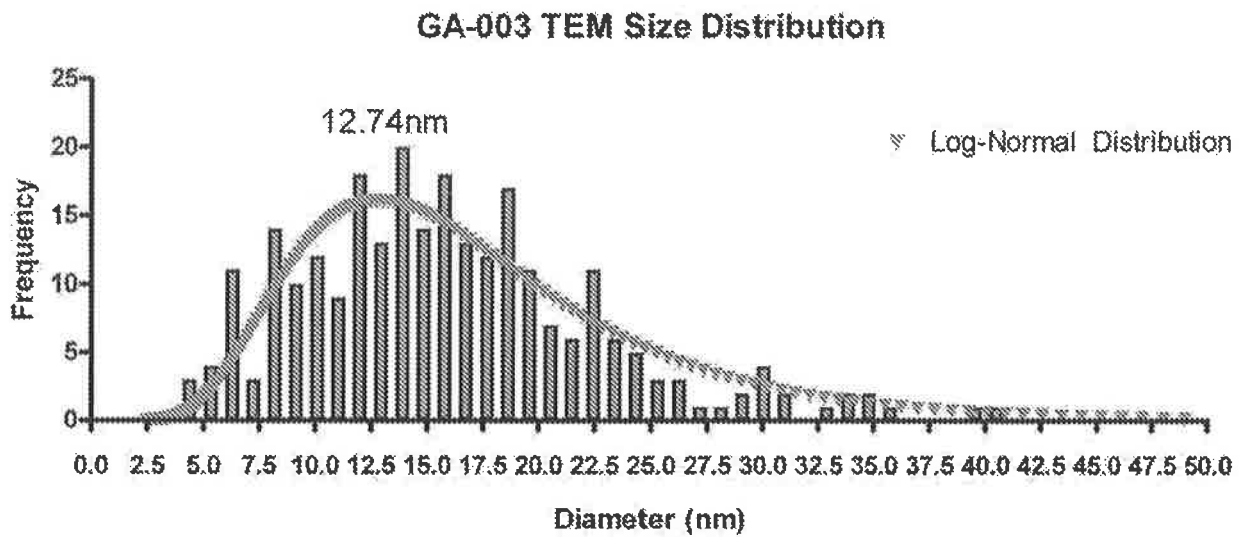


Figure 75b

Gold GA-003
10.40% transmission

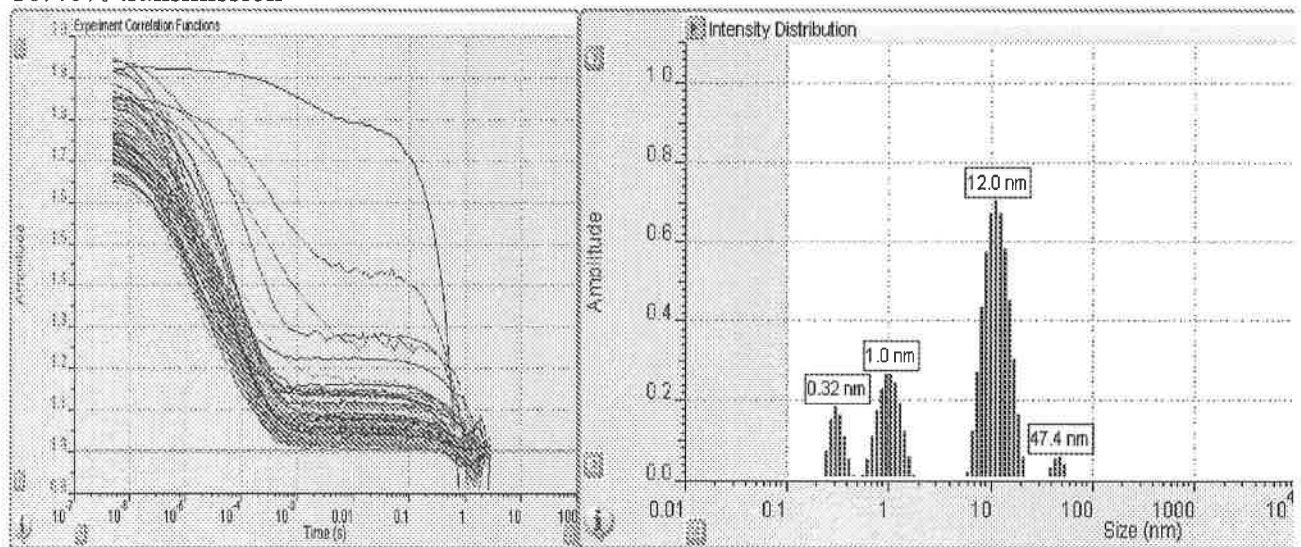
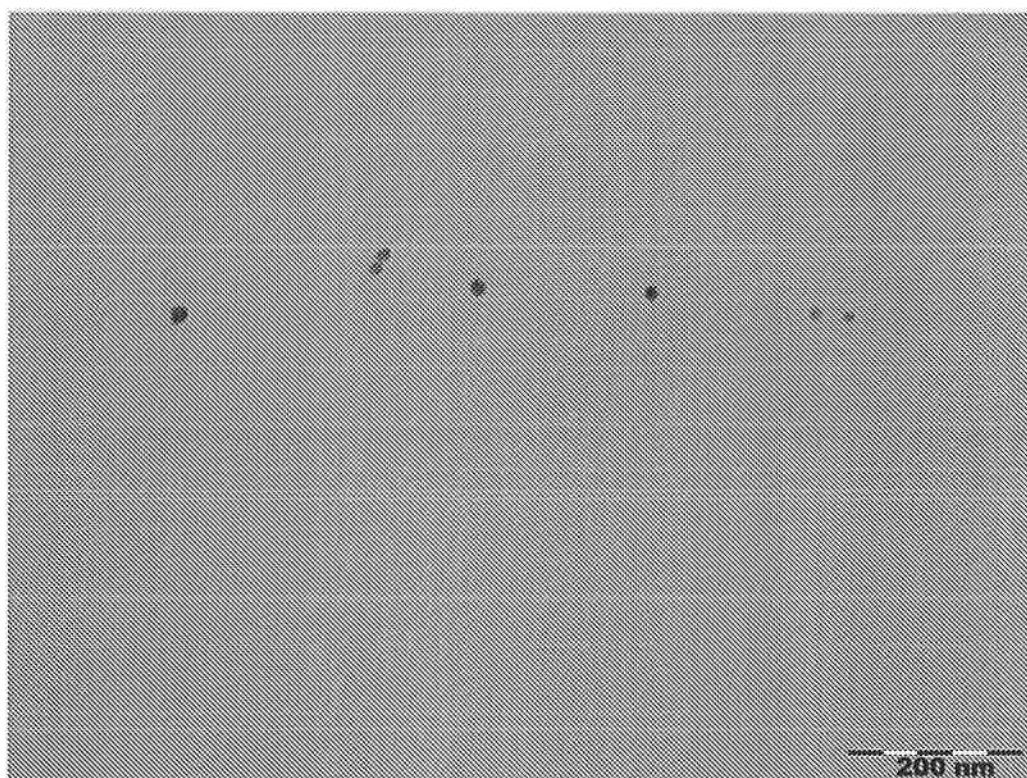
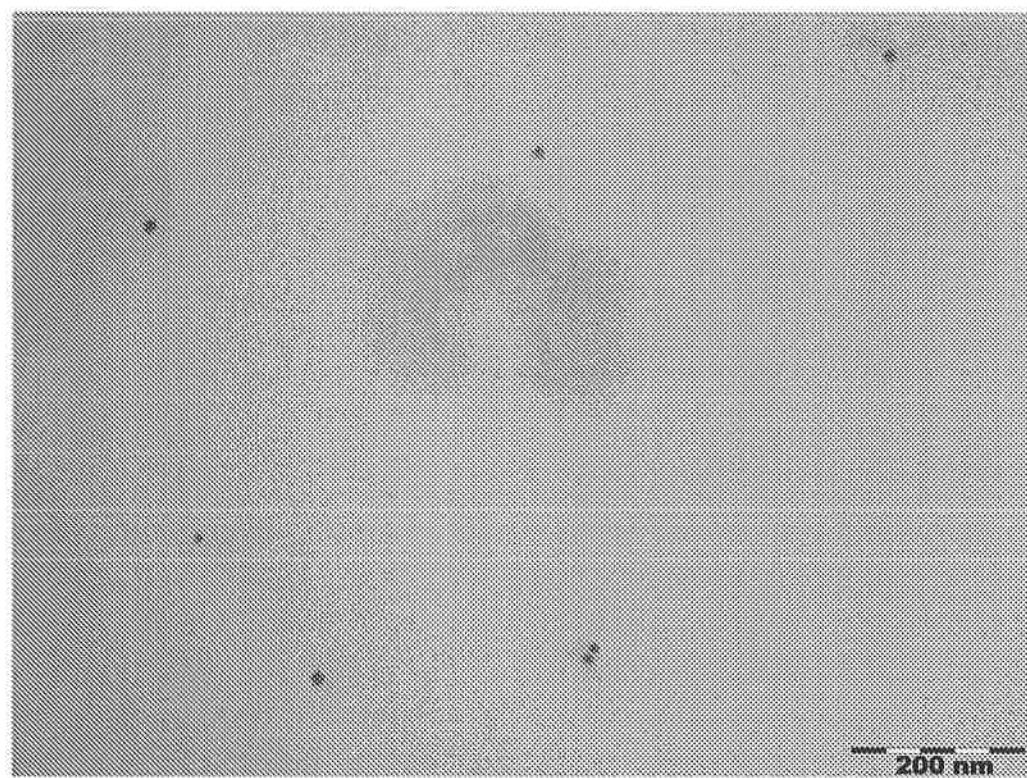


Figure 75c



a1



a2

Figure 76
GA-004

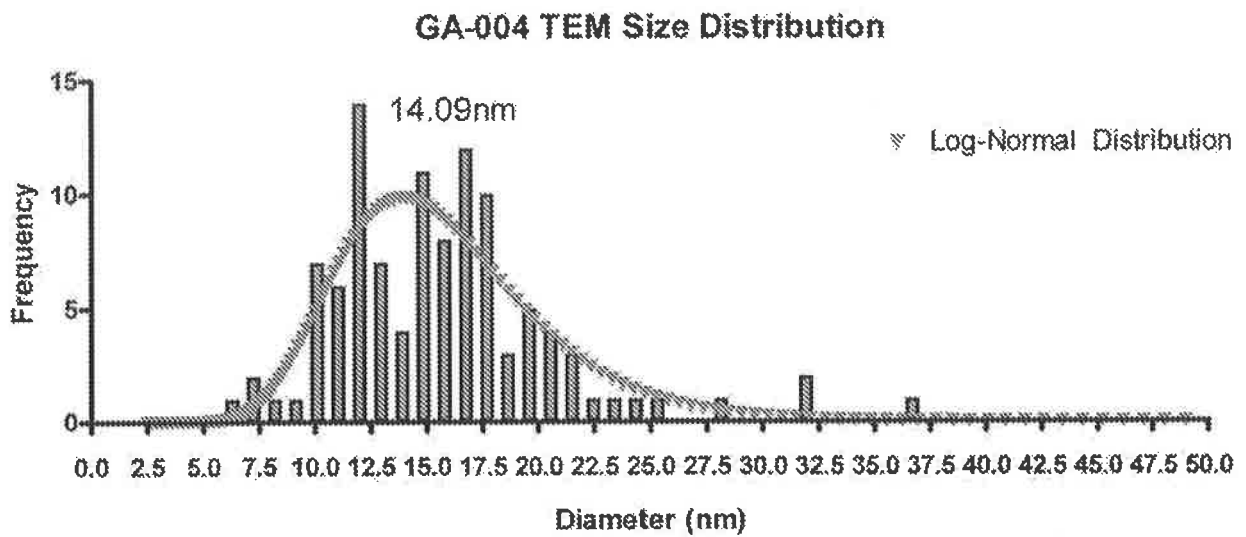


Figure 76b

Gold GA-004
8.43% transmission

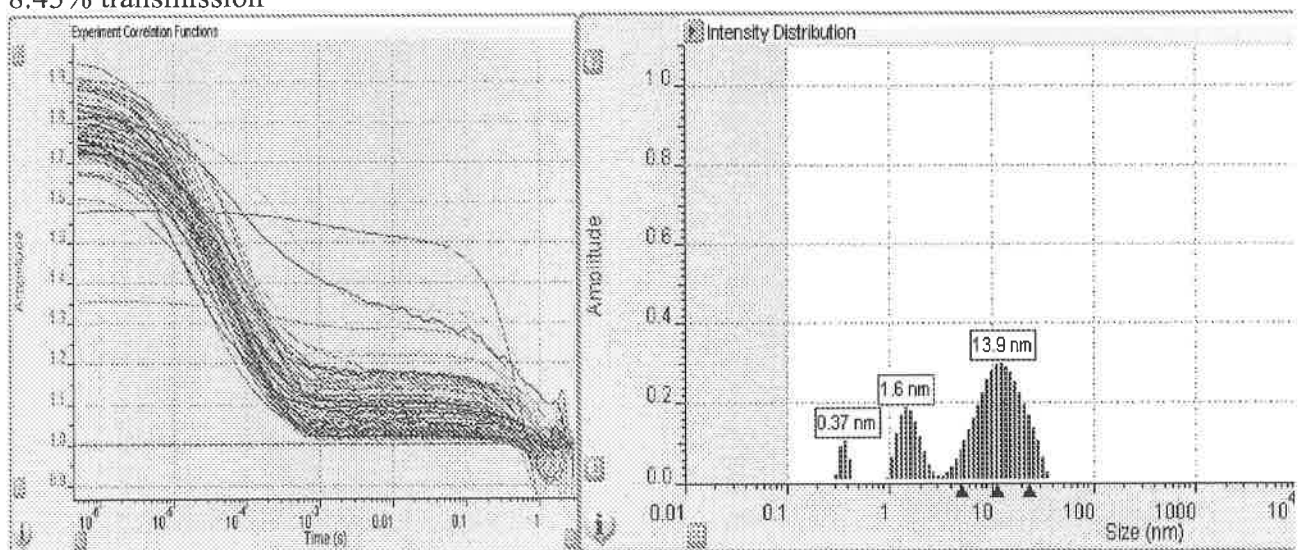
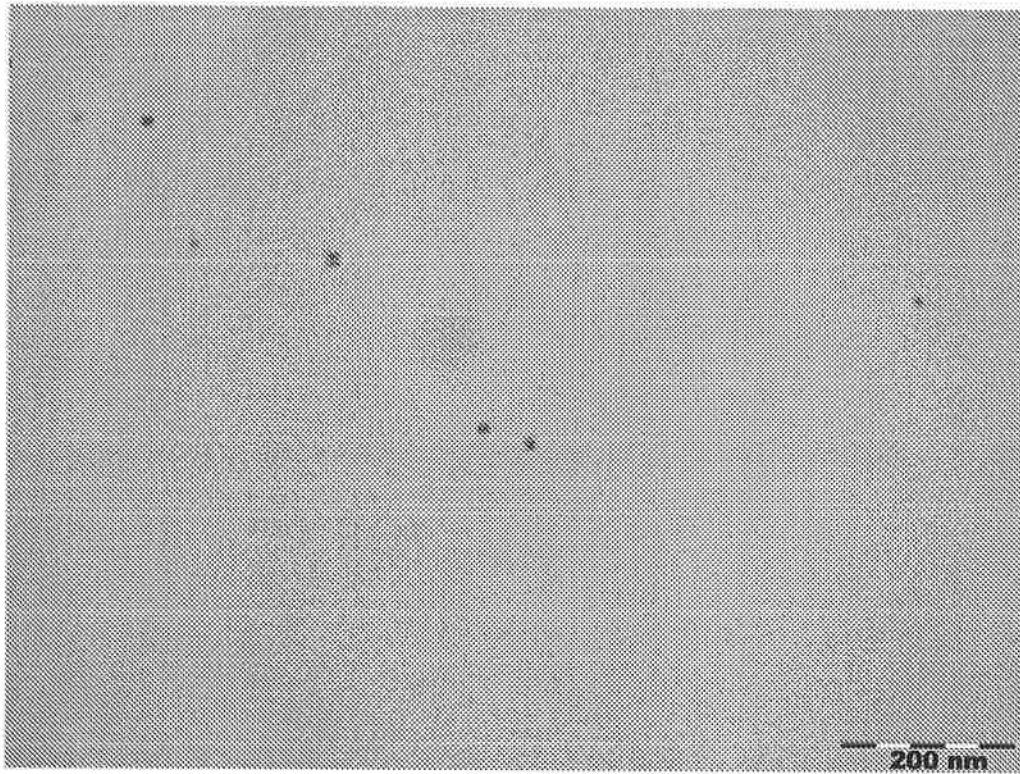
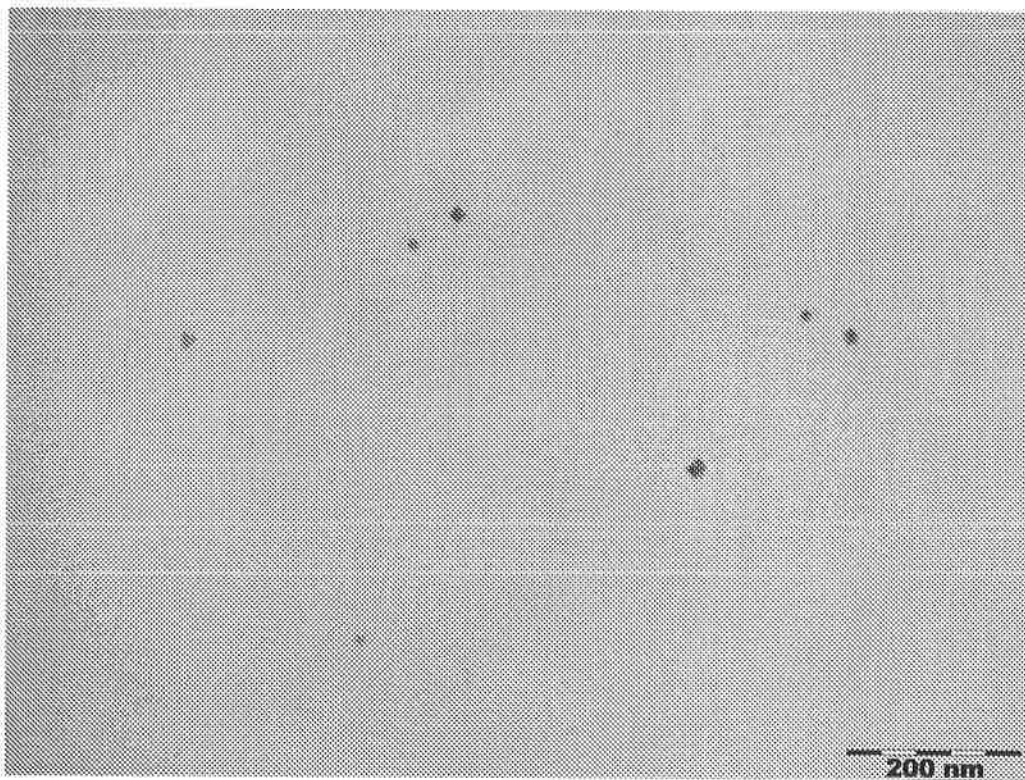


Figure 76c

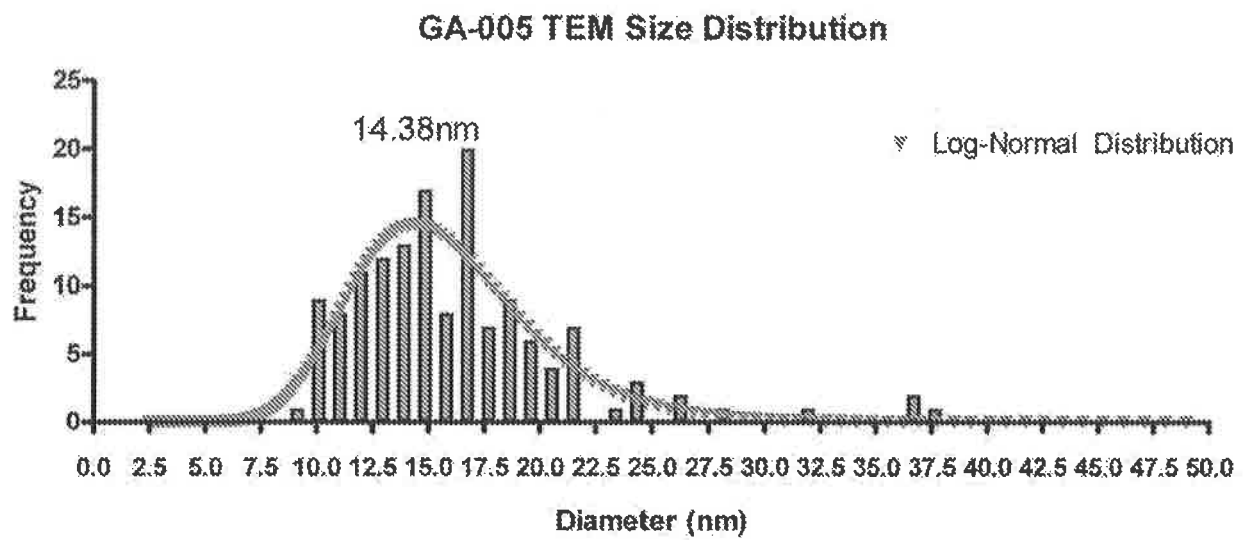


a1



a2

Figure 77
GA-005



Gold GA-005
3.61% transmission

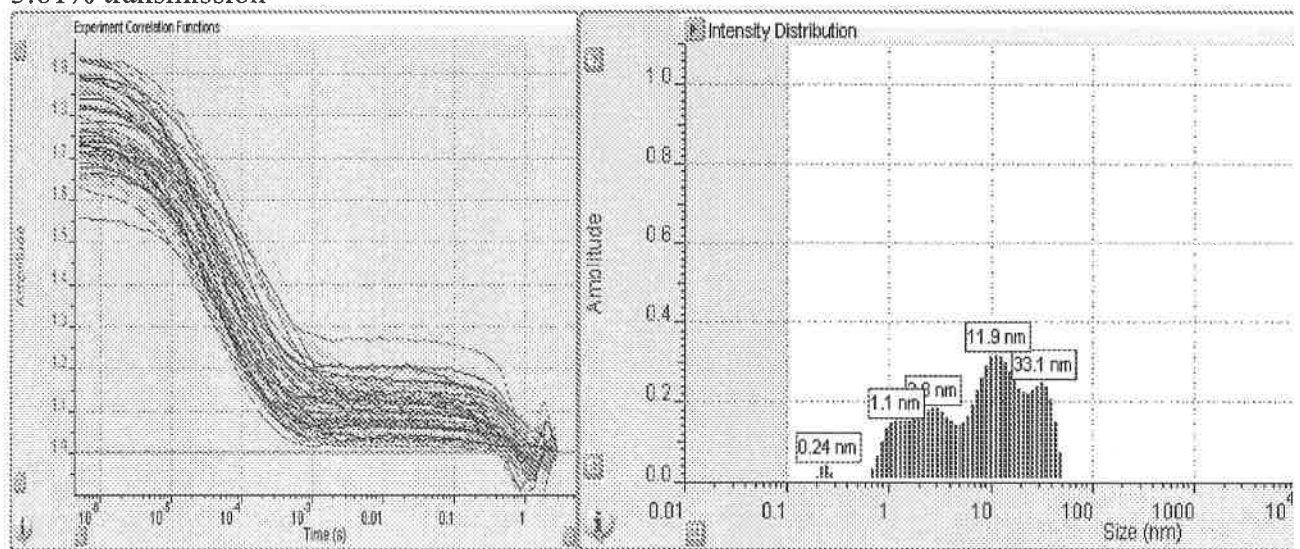
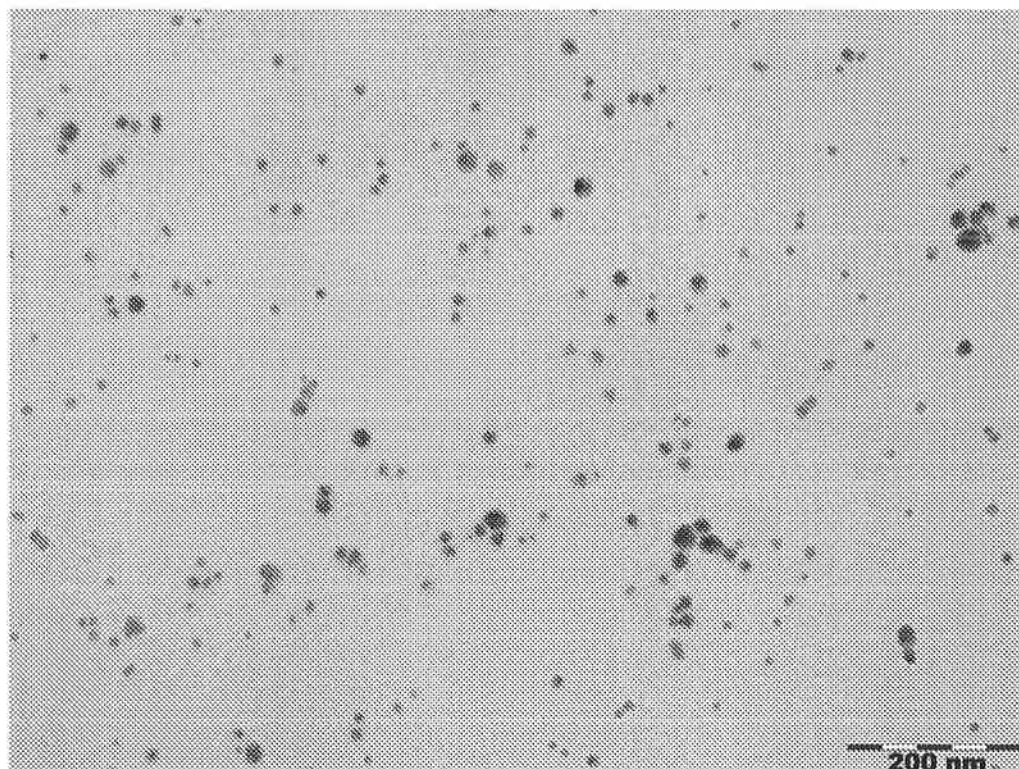
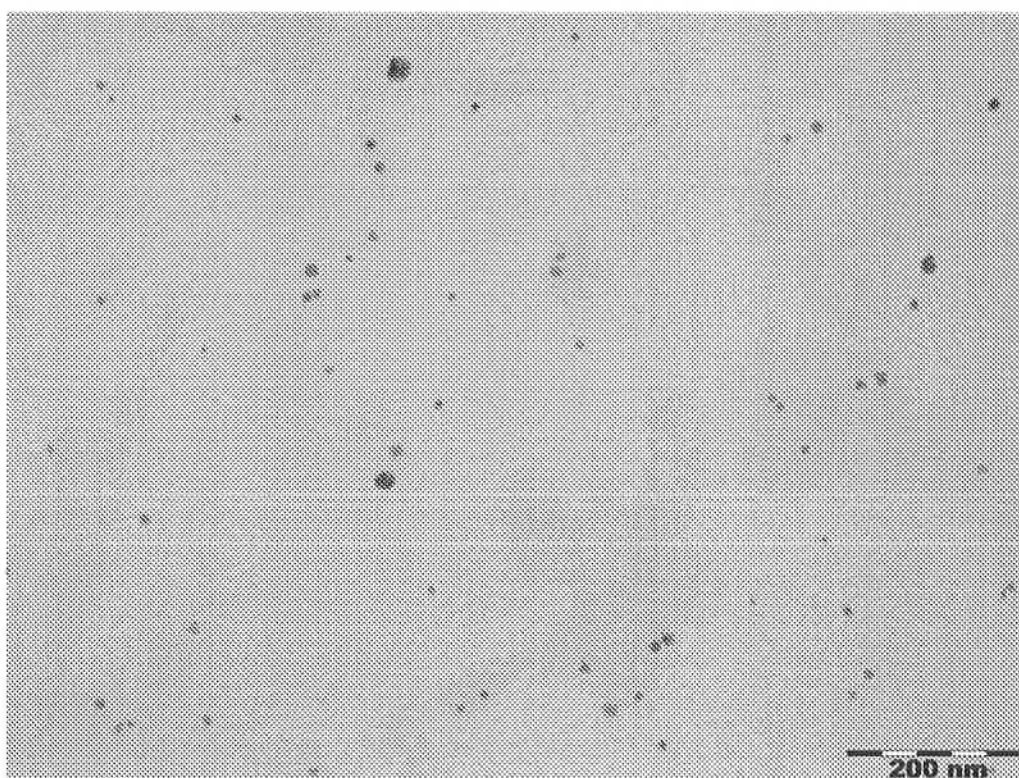


Figure 77c

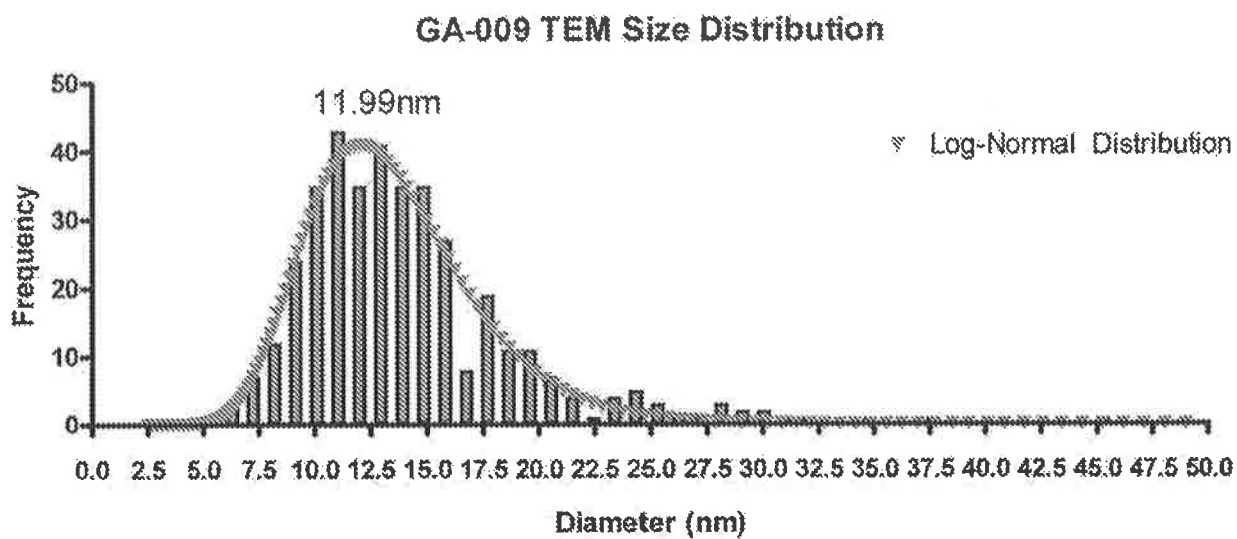


a1

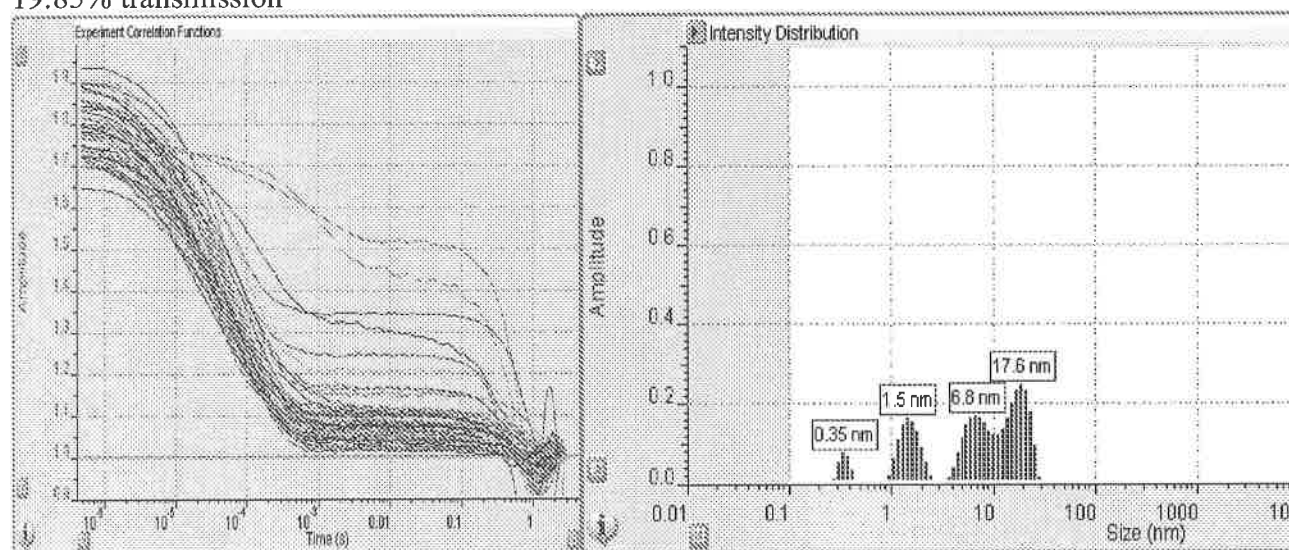


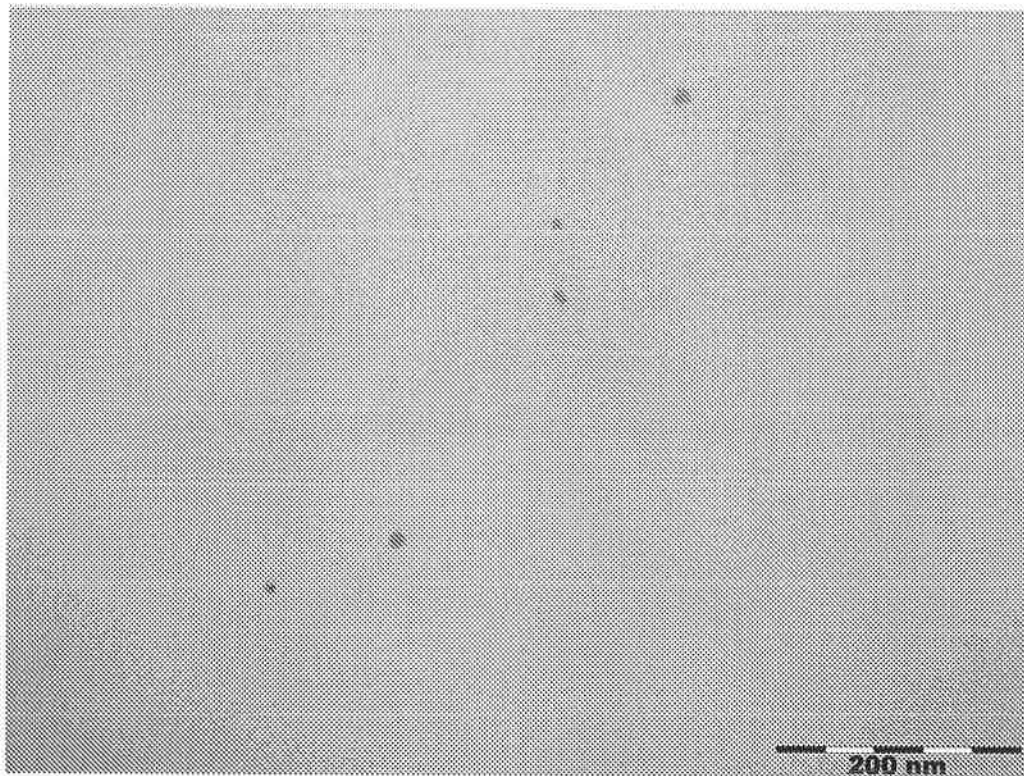
a2

Figure 78
GA-009

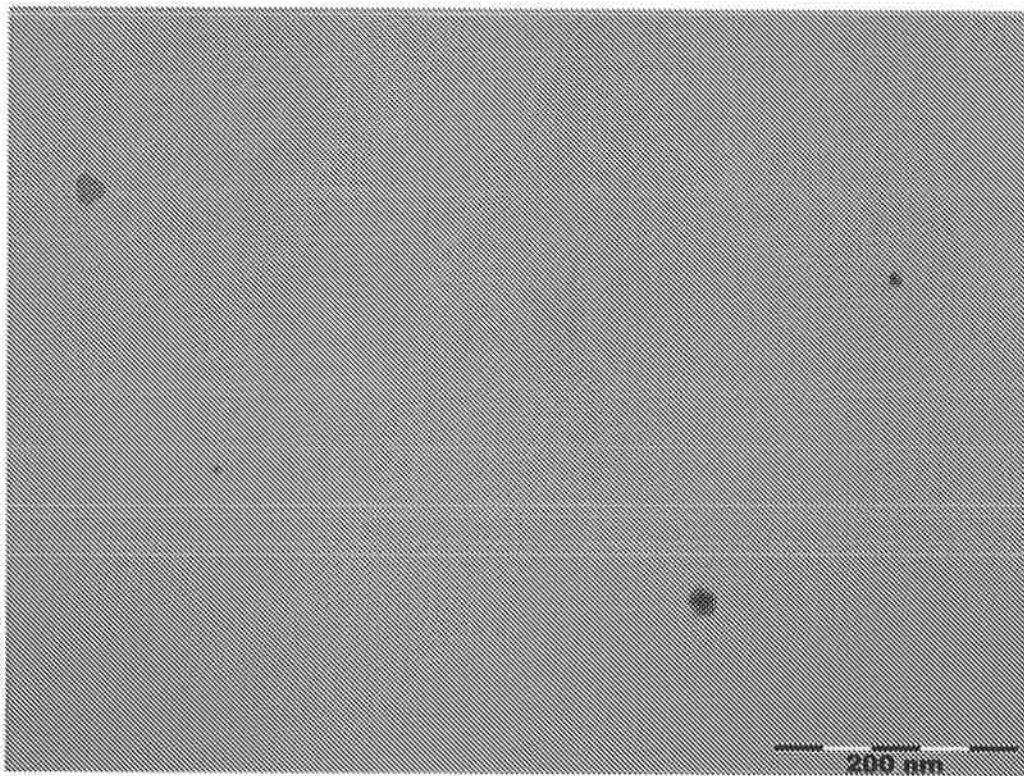


Gold GA-009
19.85% transmission





a1



a2

Figure 79
GA-011

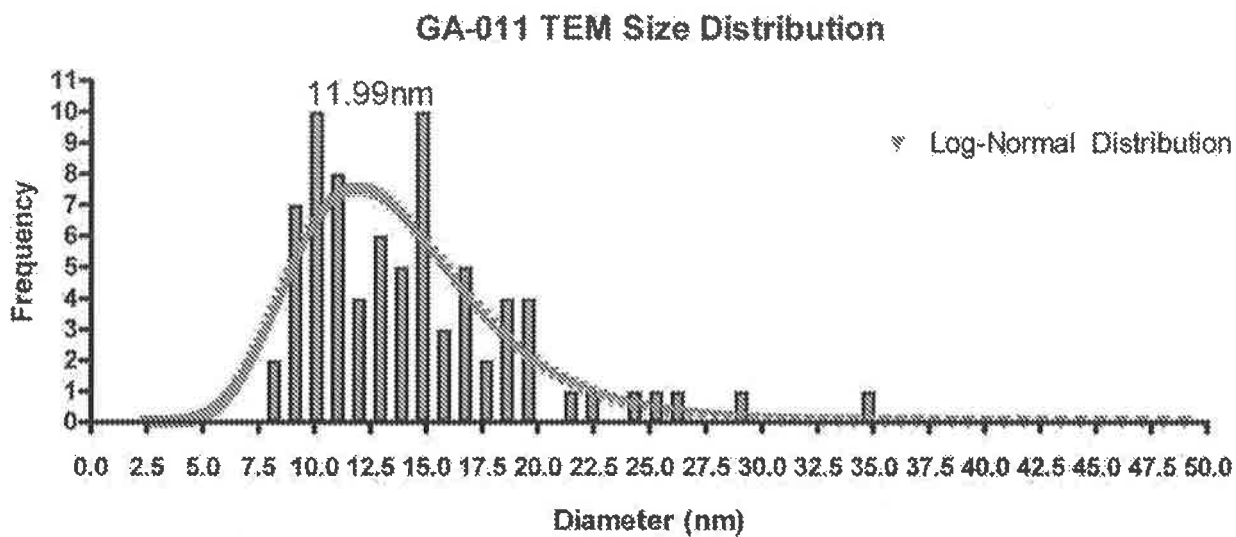


Figure 79b

Gold GA-011
2.42% transmission

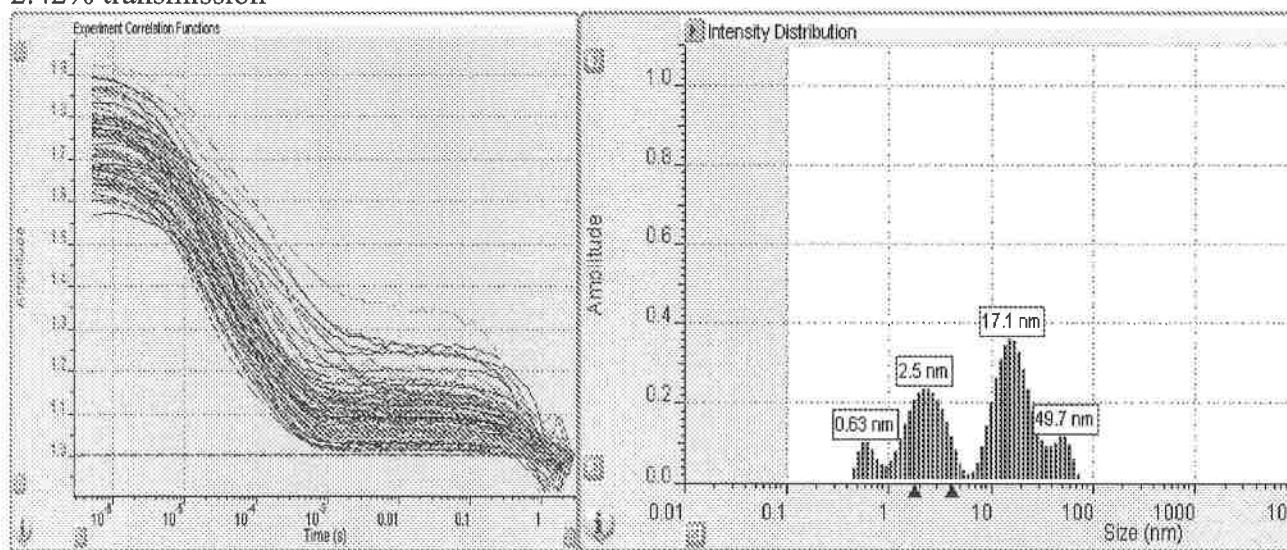
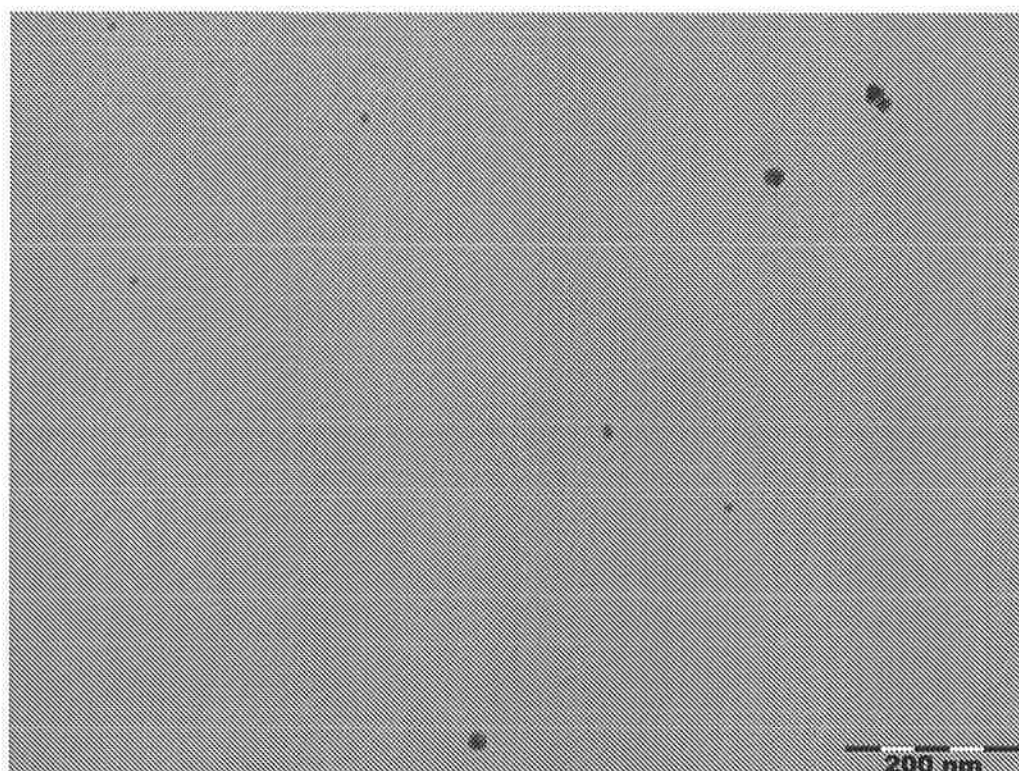
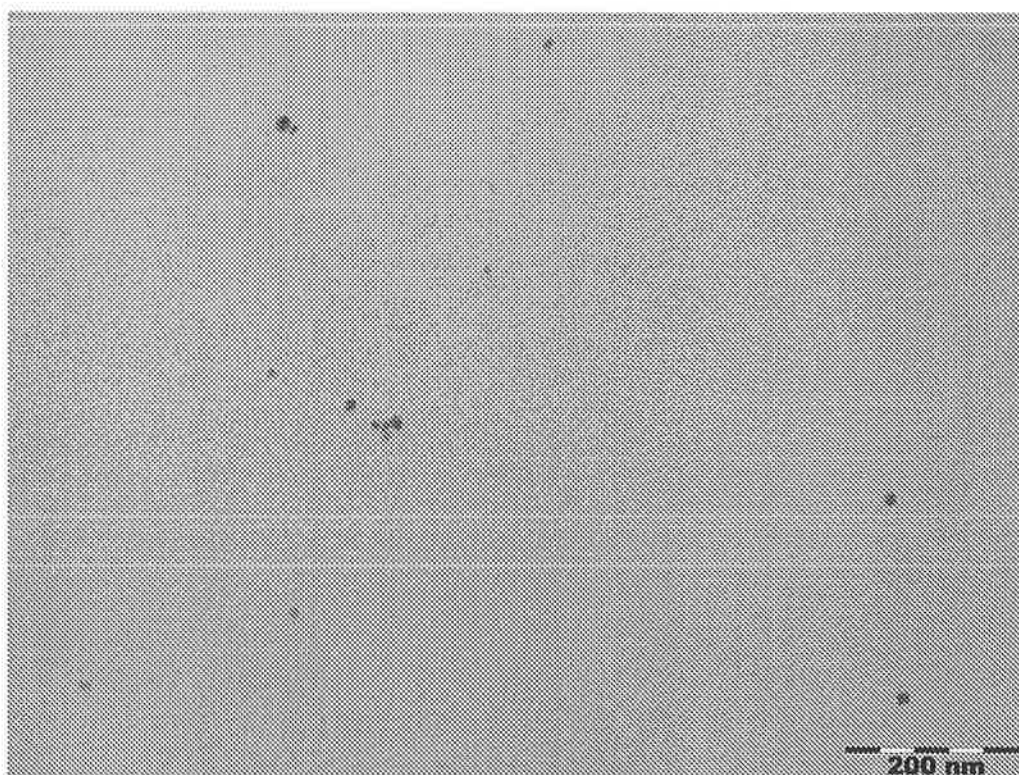


Figure 79c



a1



a2

Figure 80
GA-013

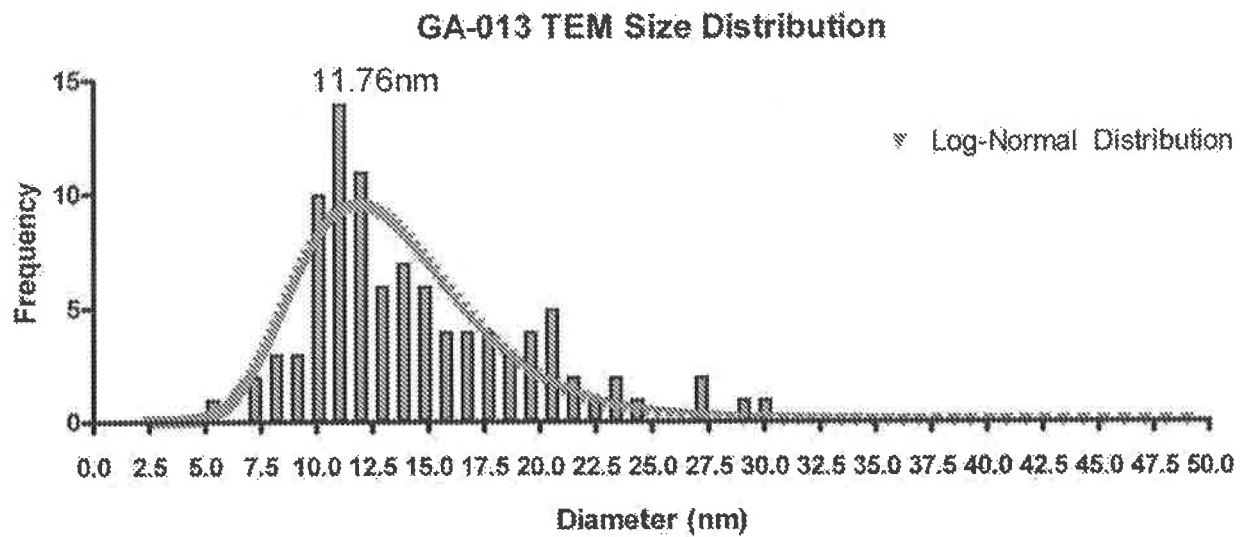


Figure 80b

Gold GA-013
14.41% transmission

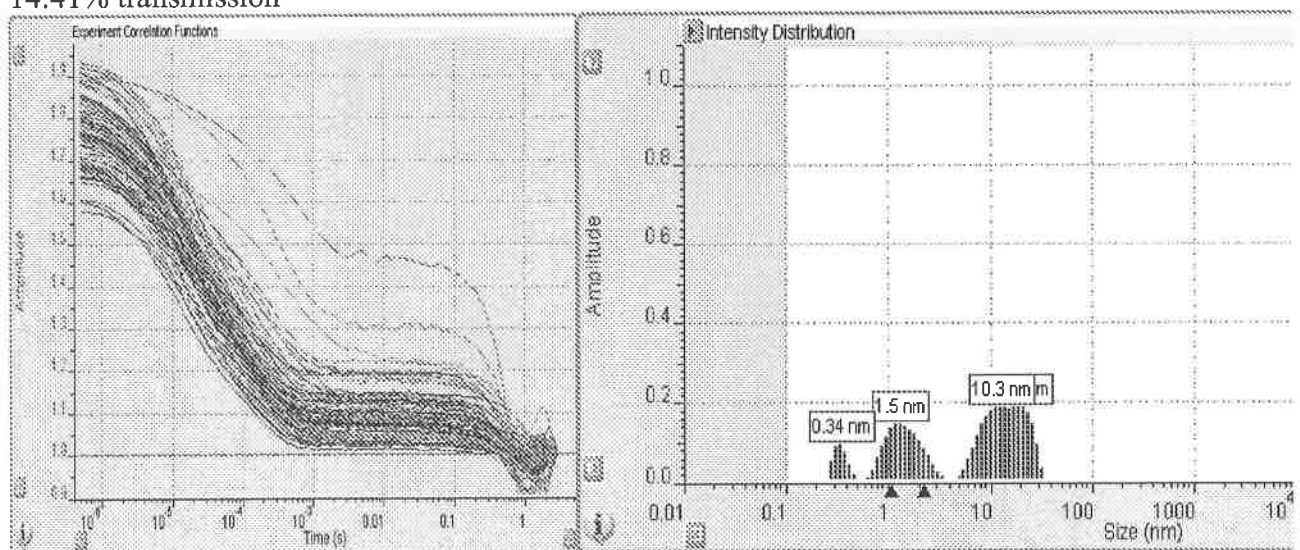


Figure 80c

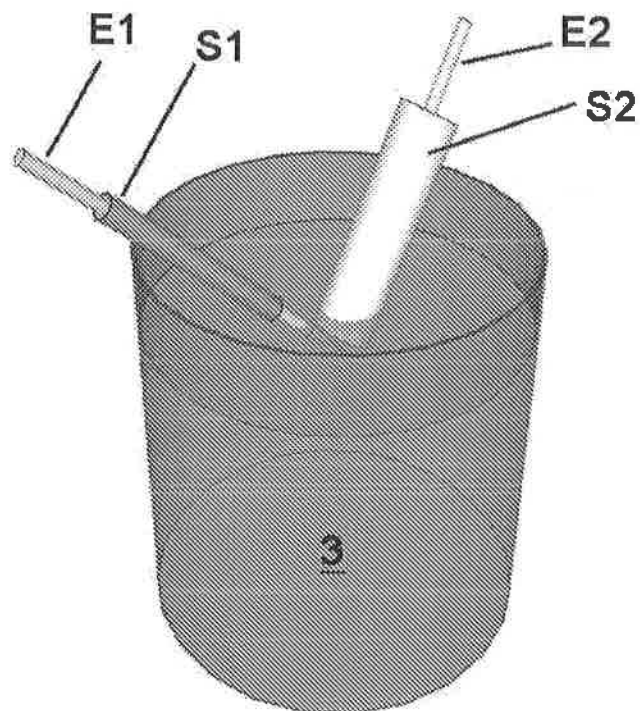


Figure 81a

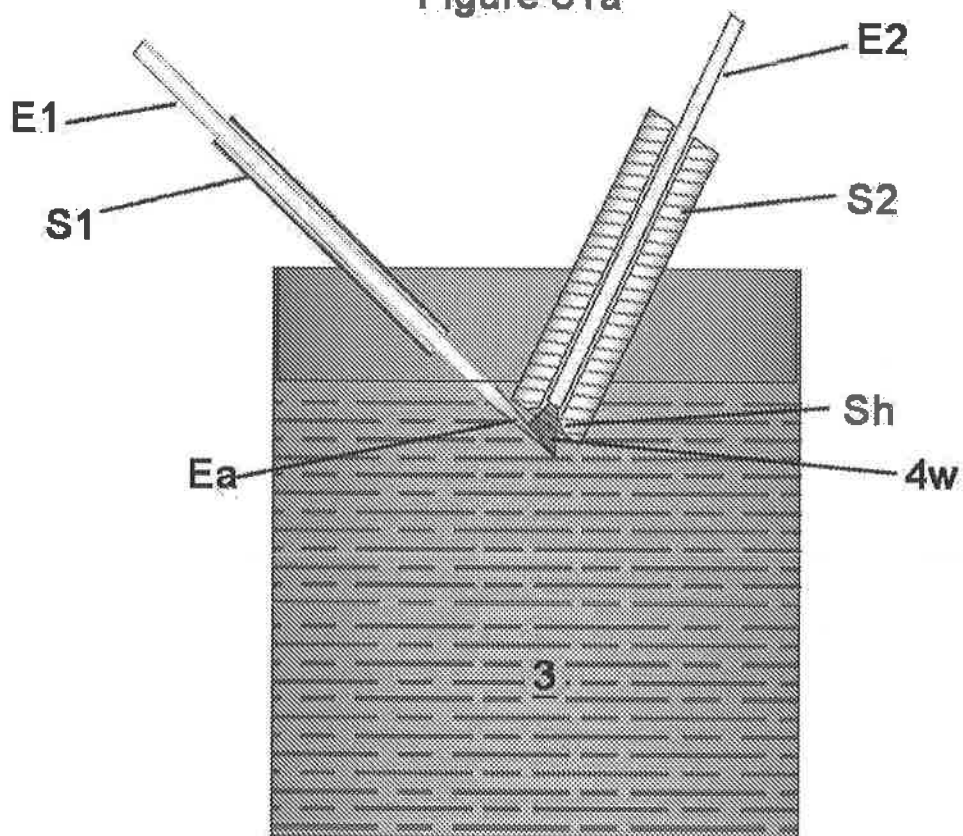


Figure 81b

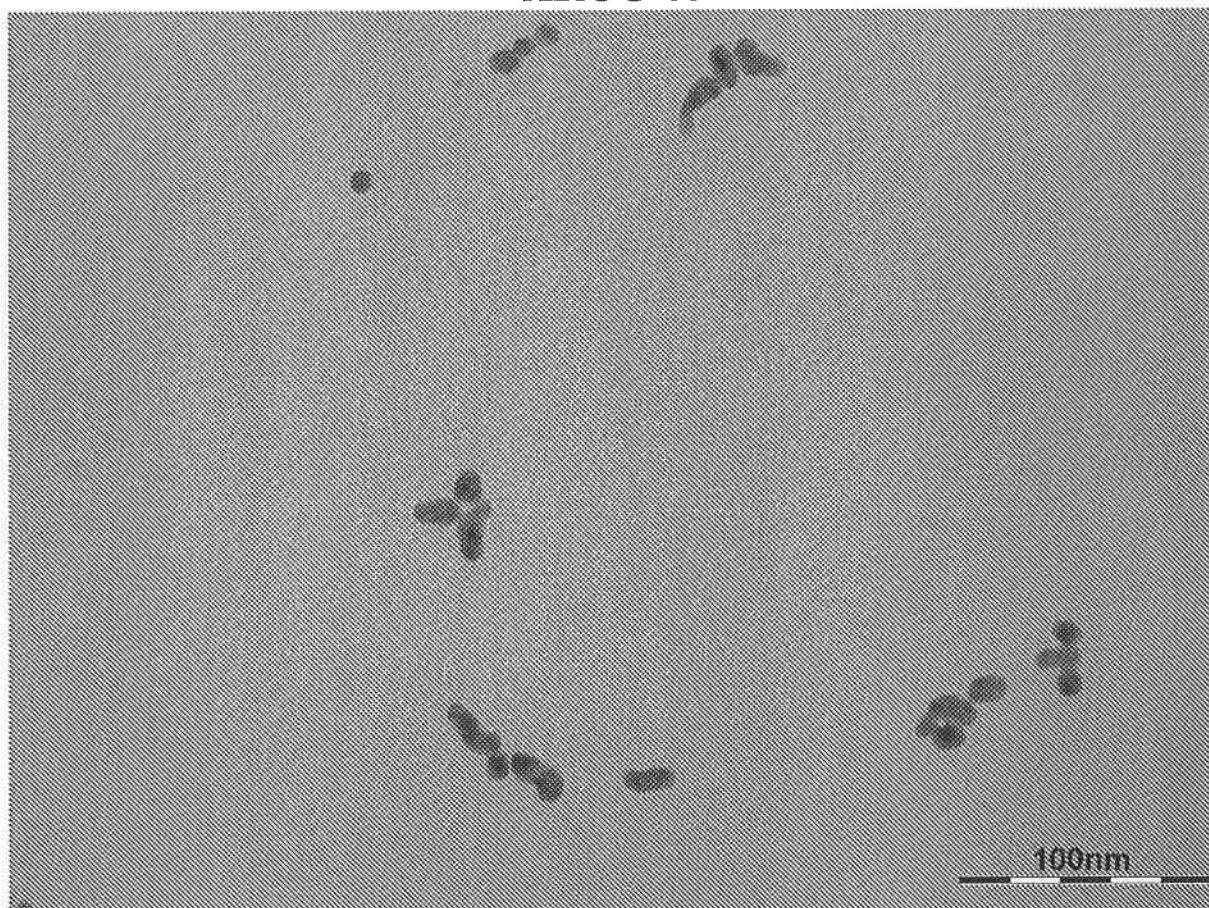
ARCG-05

Figure 82a

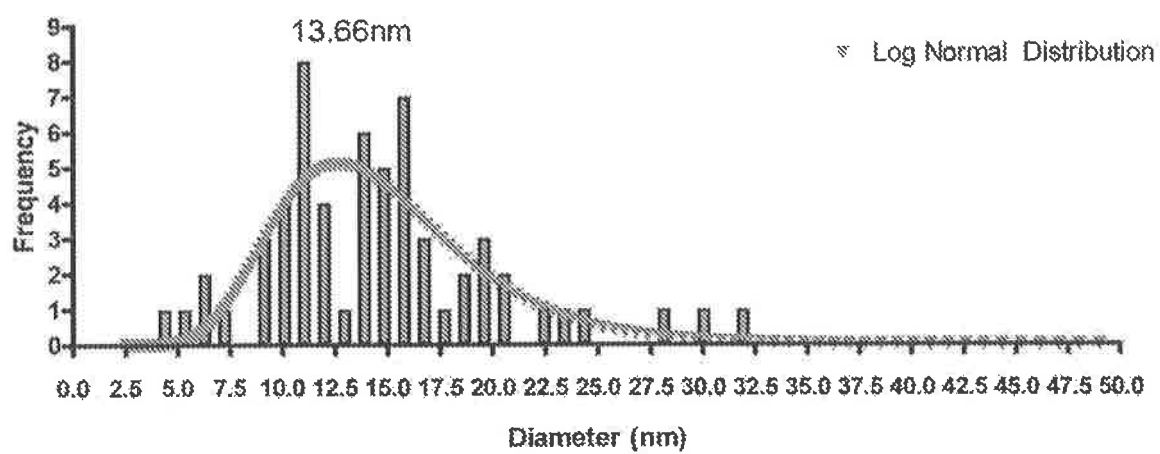
ARCG-05 TEM Size Distribution

Figure 82b

Utopia Gold

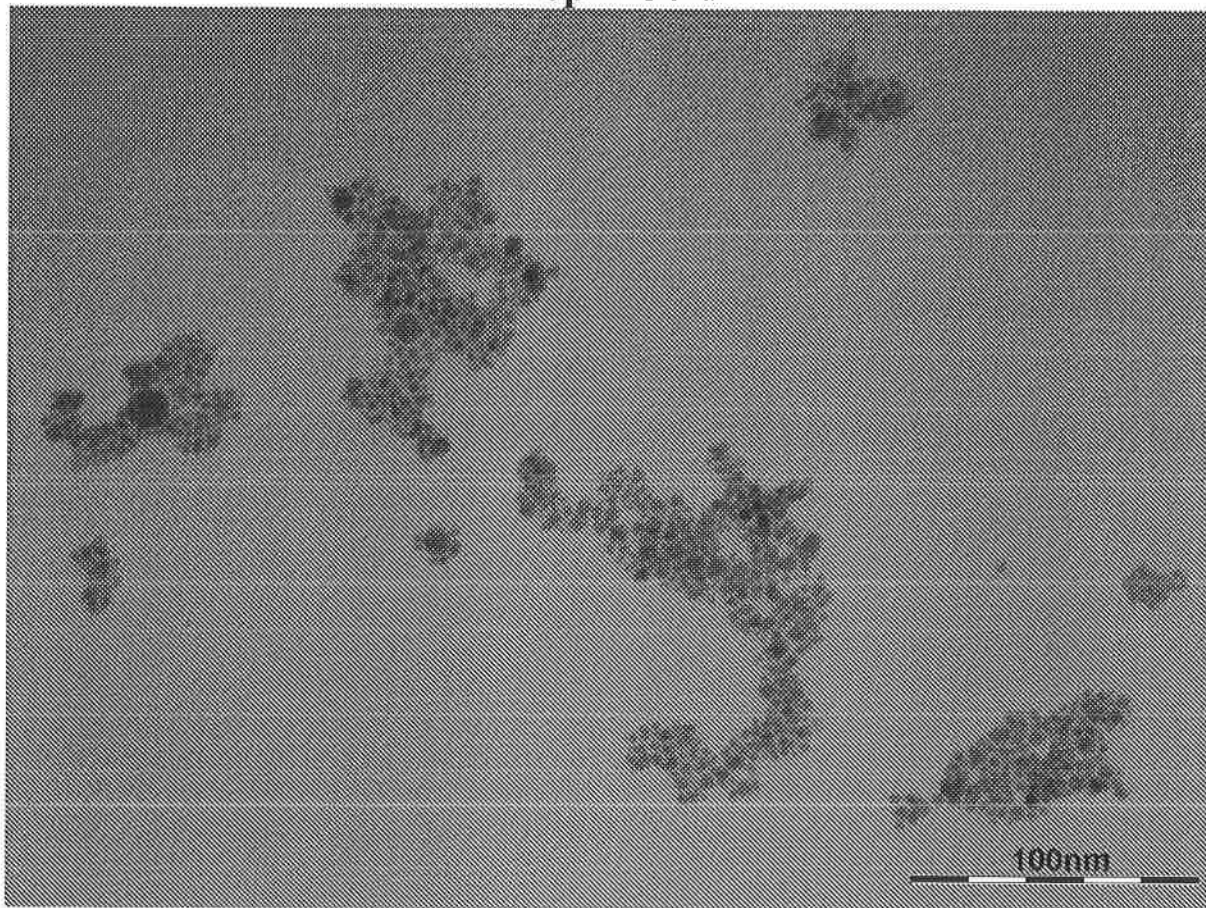


Figure 83a

Utopia Gold TEM Size Distribution

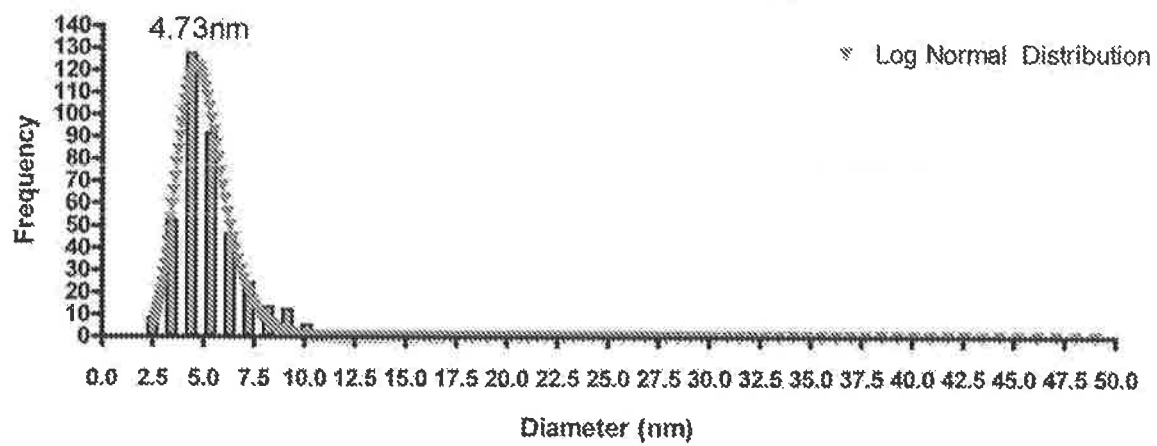


Figure 83b

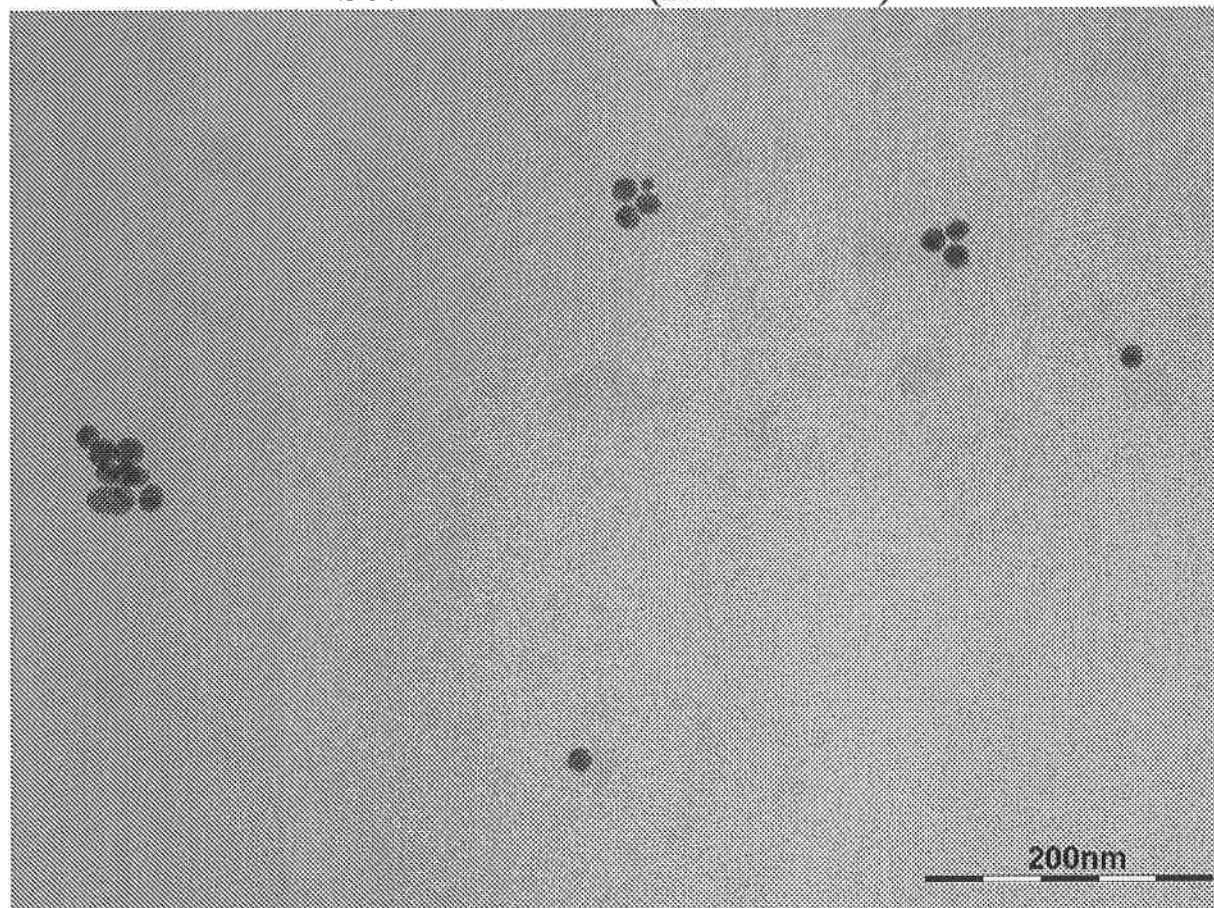
Source Naturals (SNG911219)

Figure 84a

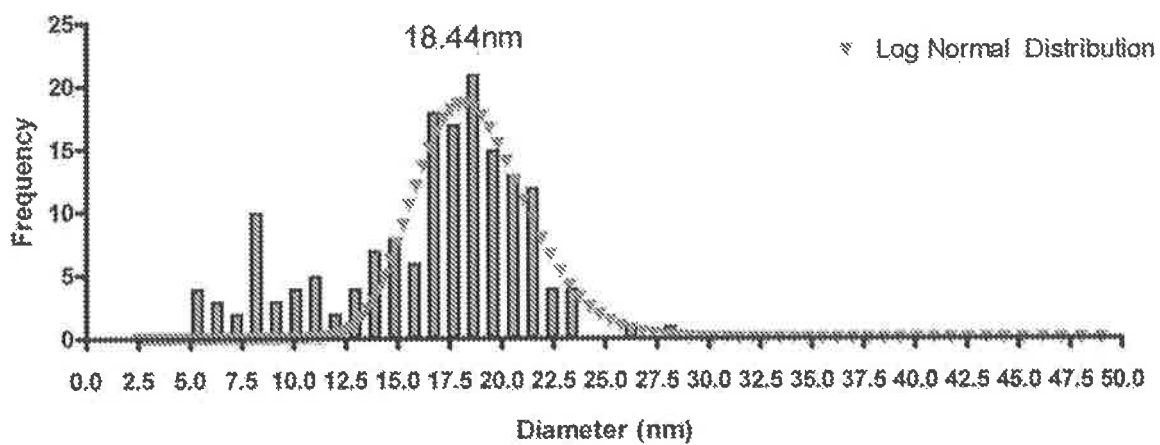
SNG911219 TEM Size Distribution

Figure 84b

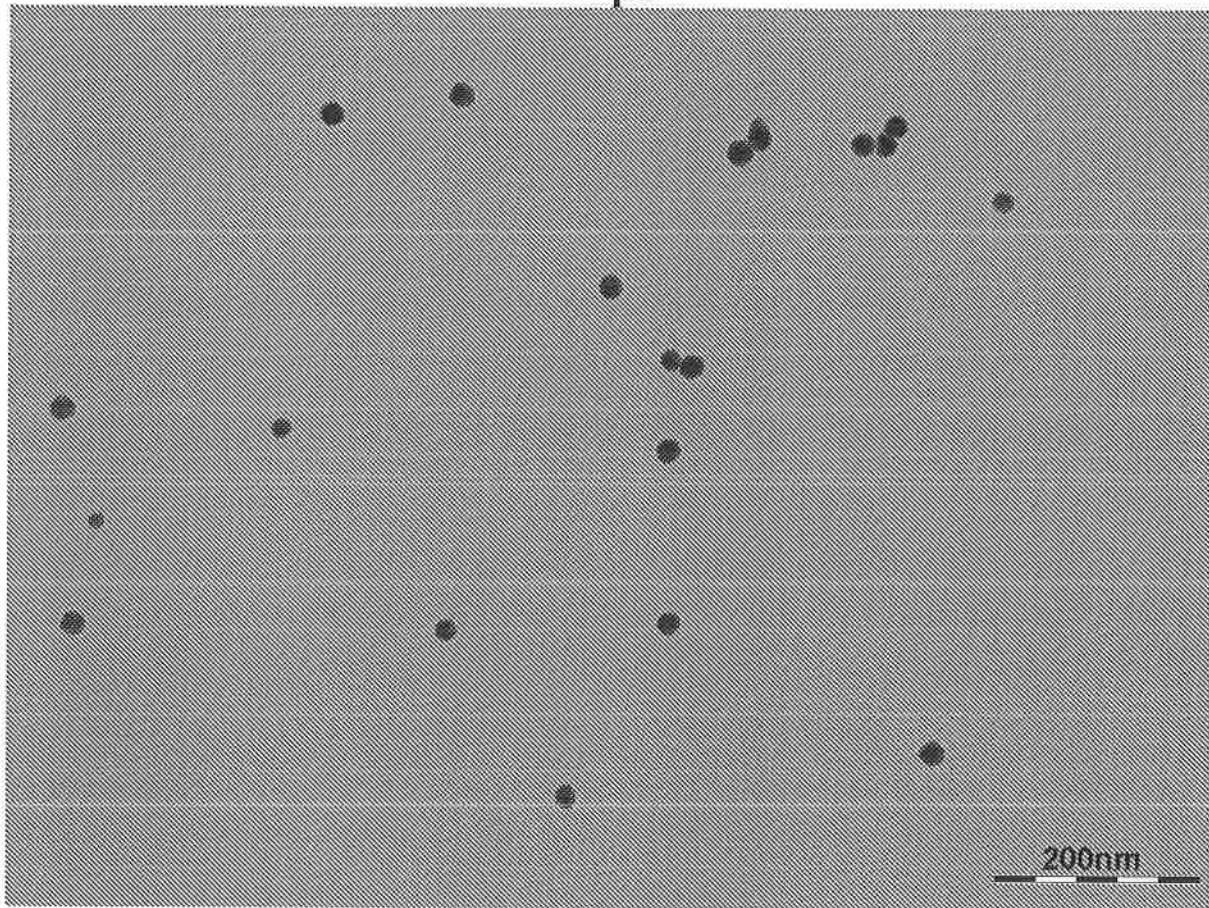
Nanopartz

Figure 85a

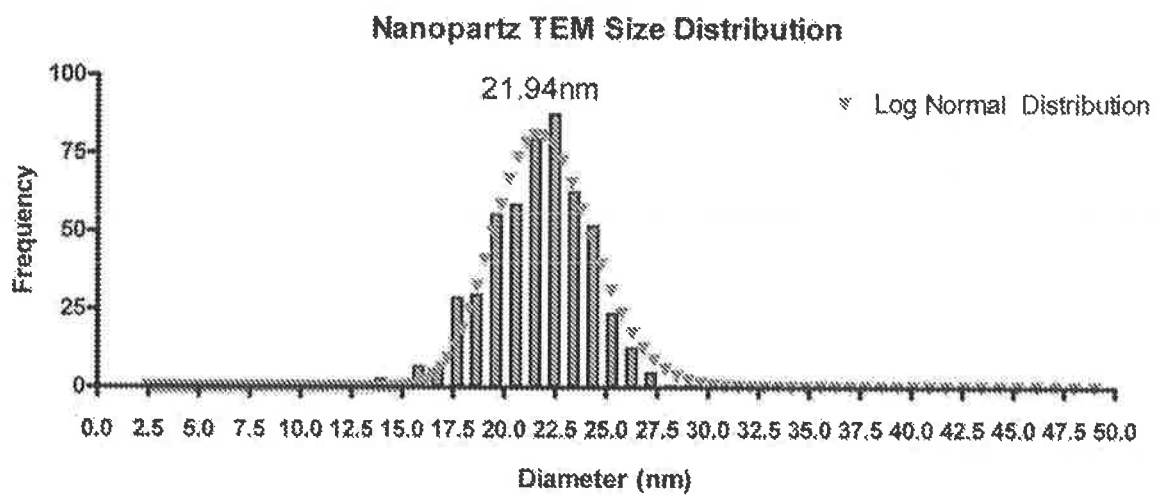


Figure 85b

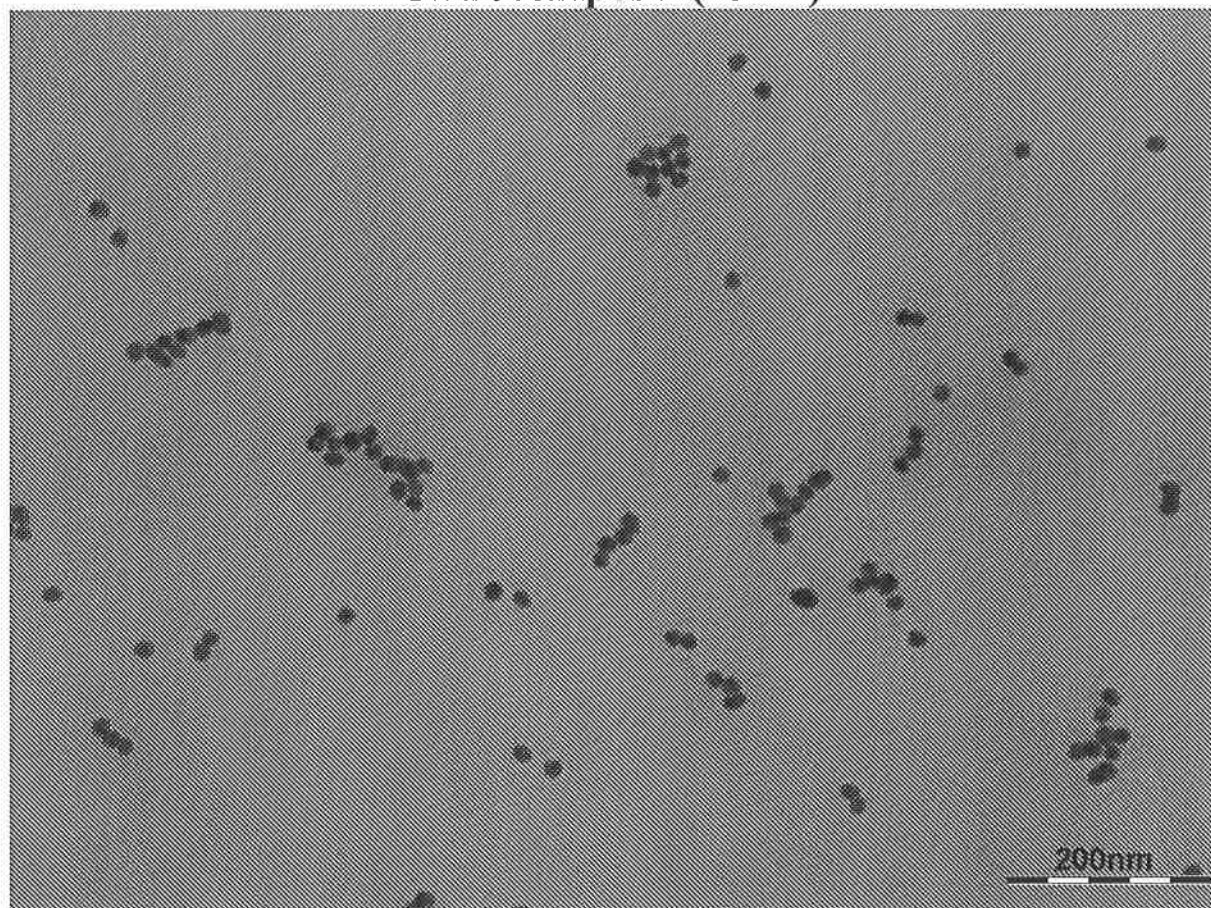
Nanocomposix (15nm)

Figure 86a

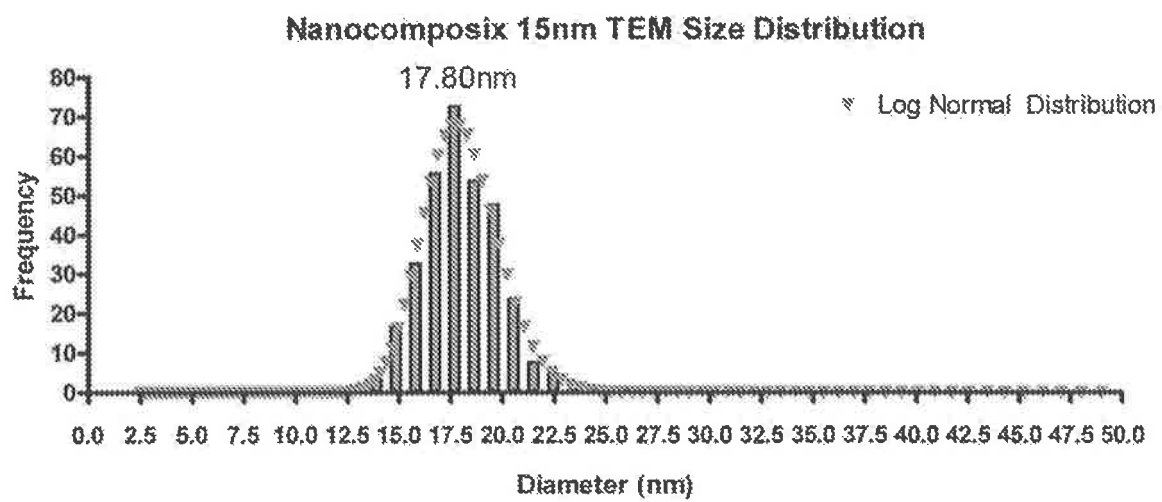


Figure 86b

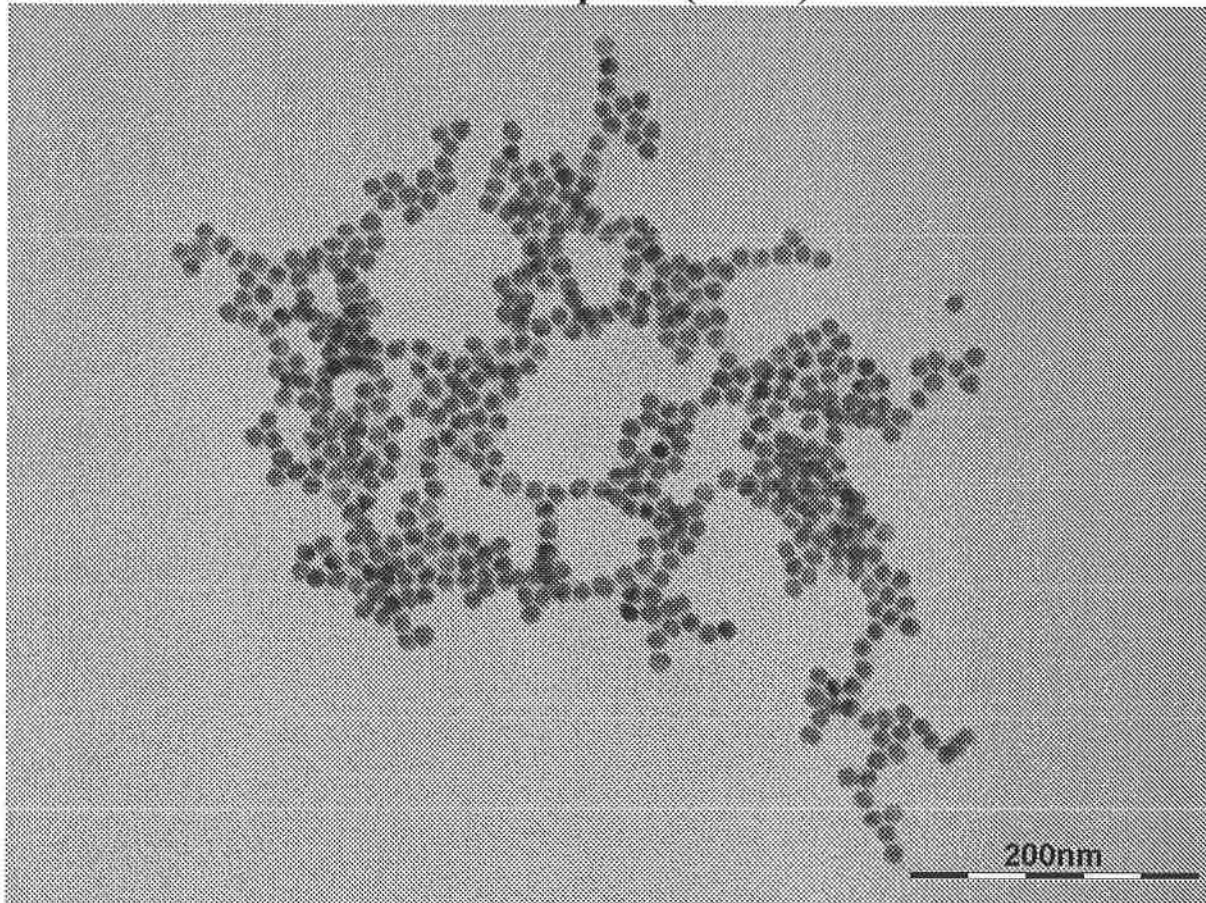
Nanocomposix (10nm)

Figure 87a

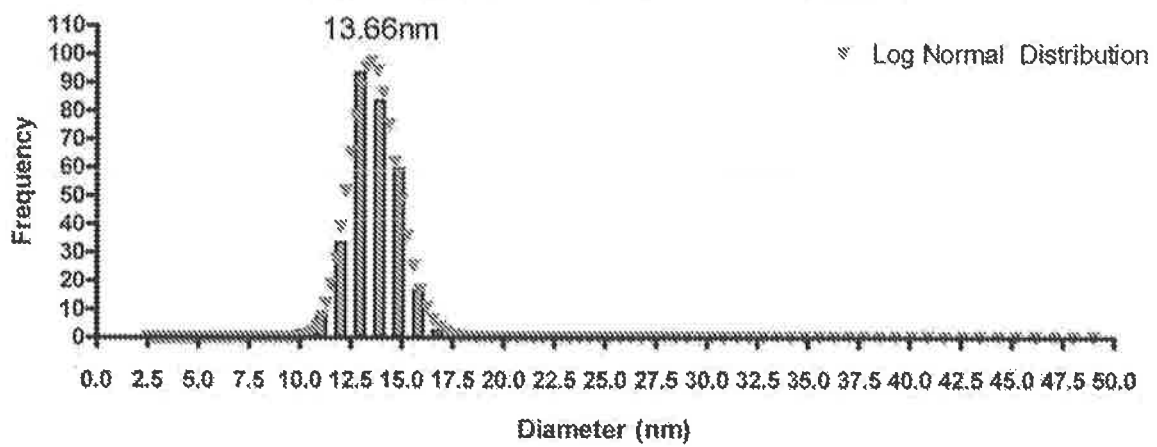
Nanocomposix 11nm TEM Size Distribution

Figure 87b

Harmonic Gold

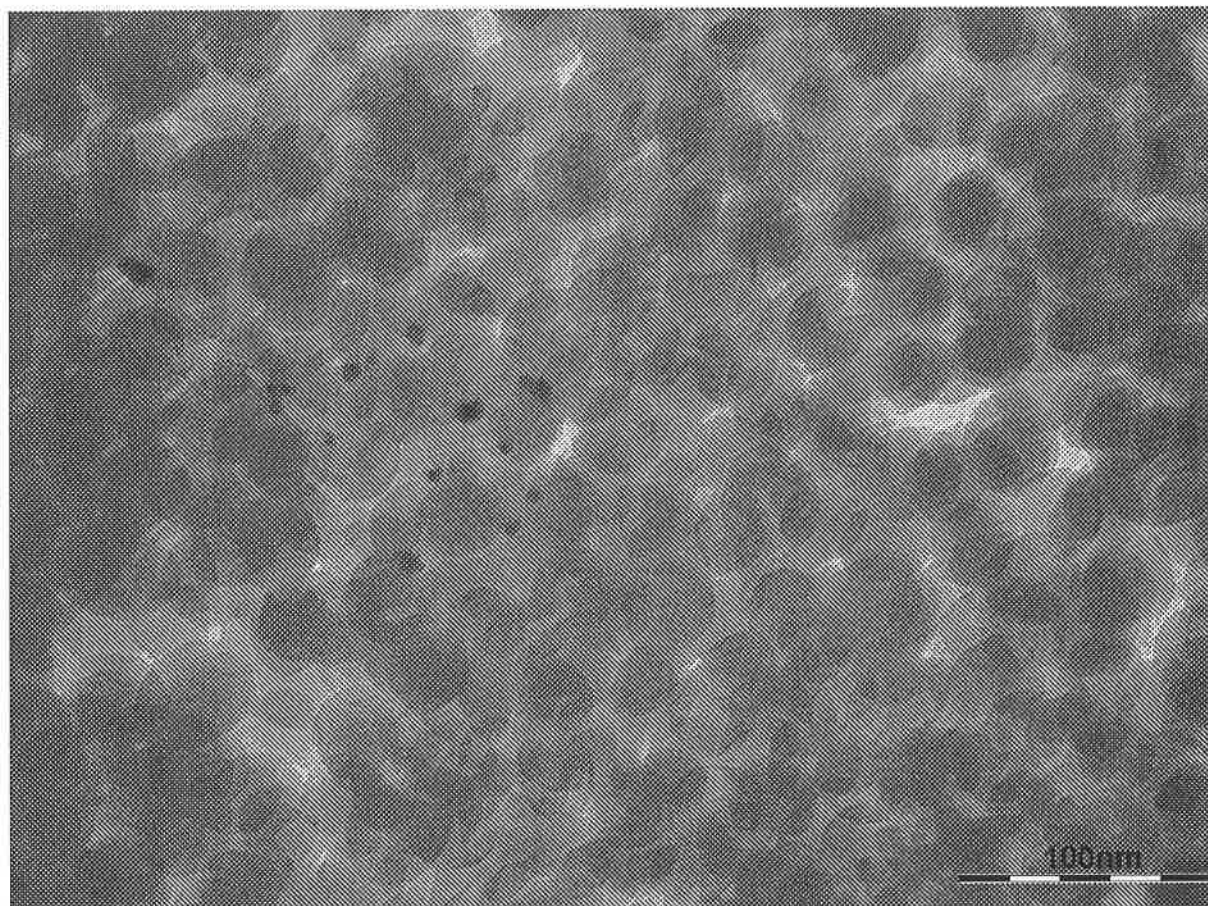


Figure 88a

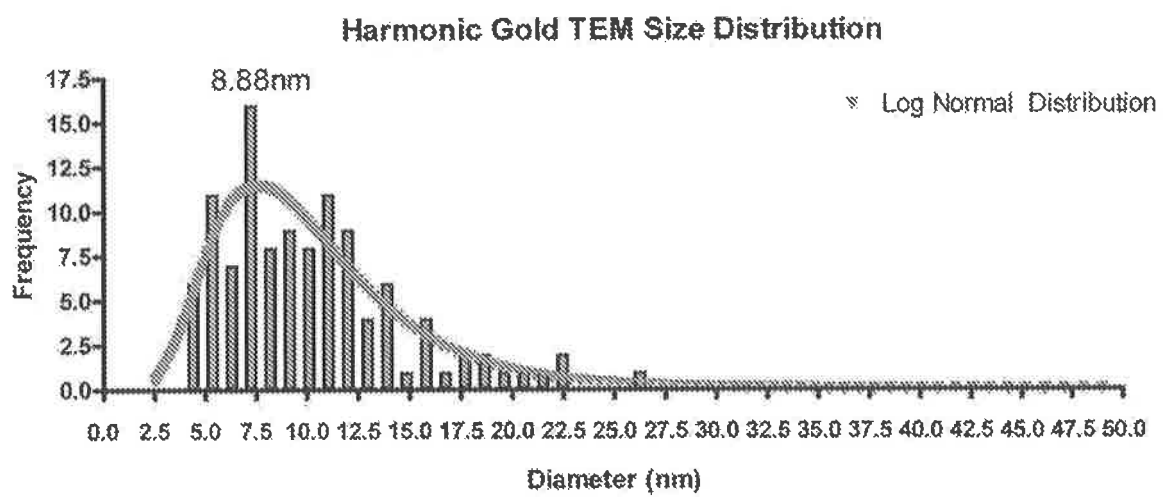


Figure 88b

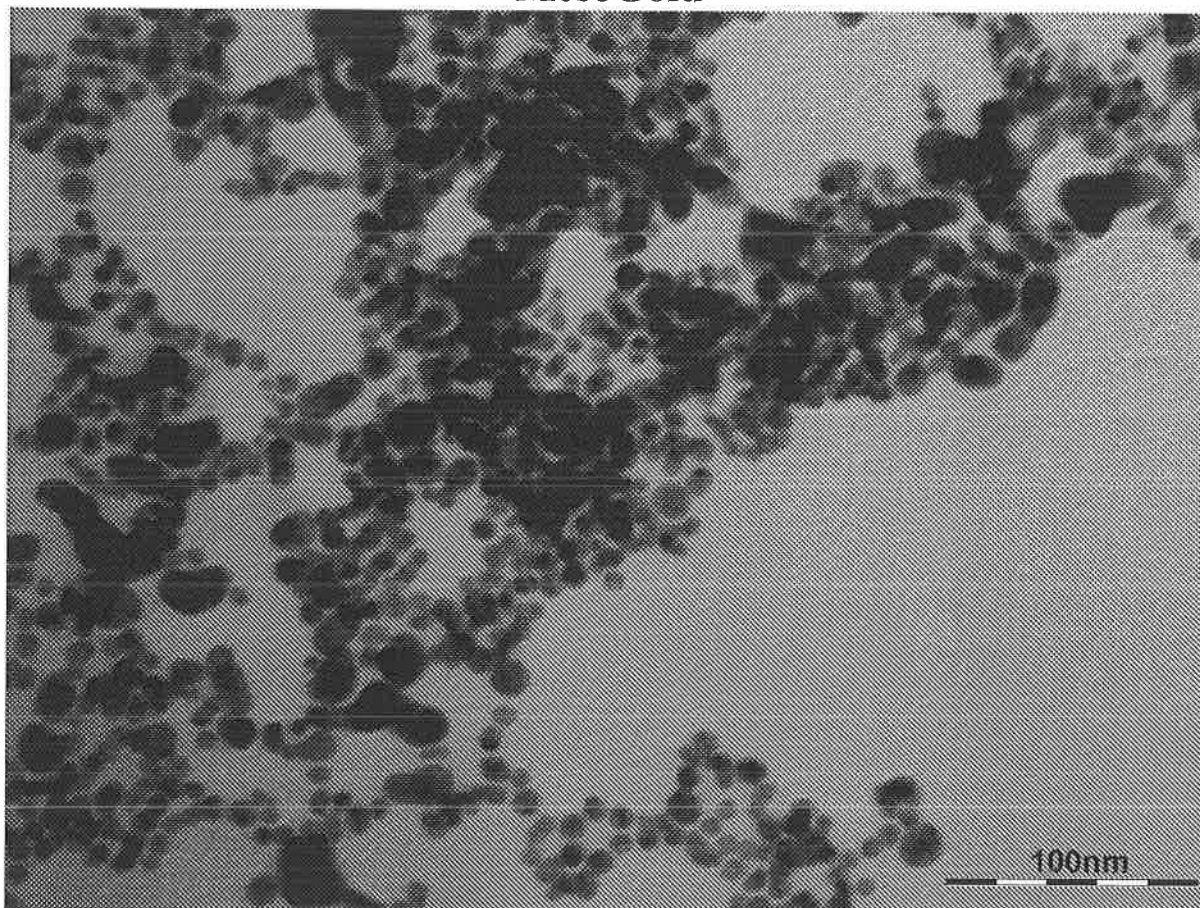
MesoGold

Figure 89a

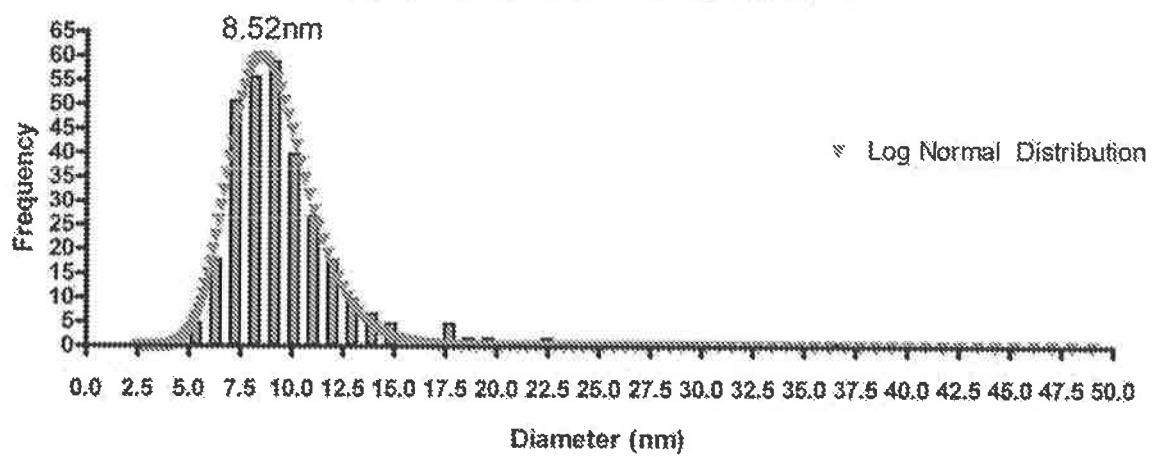
Meso-10098 TEM Size Distribution

Figure 89b

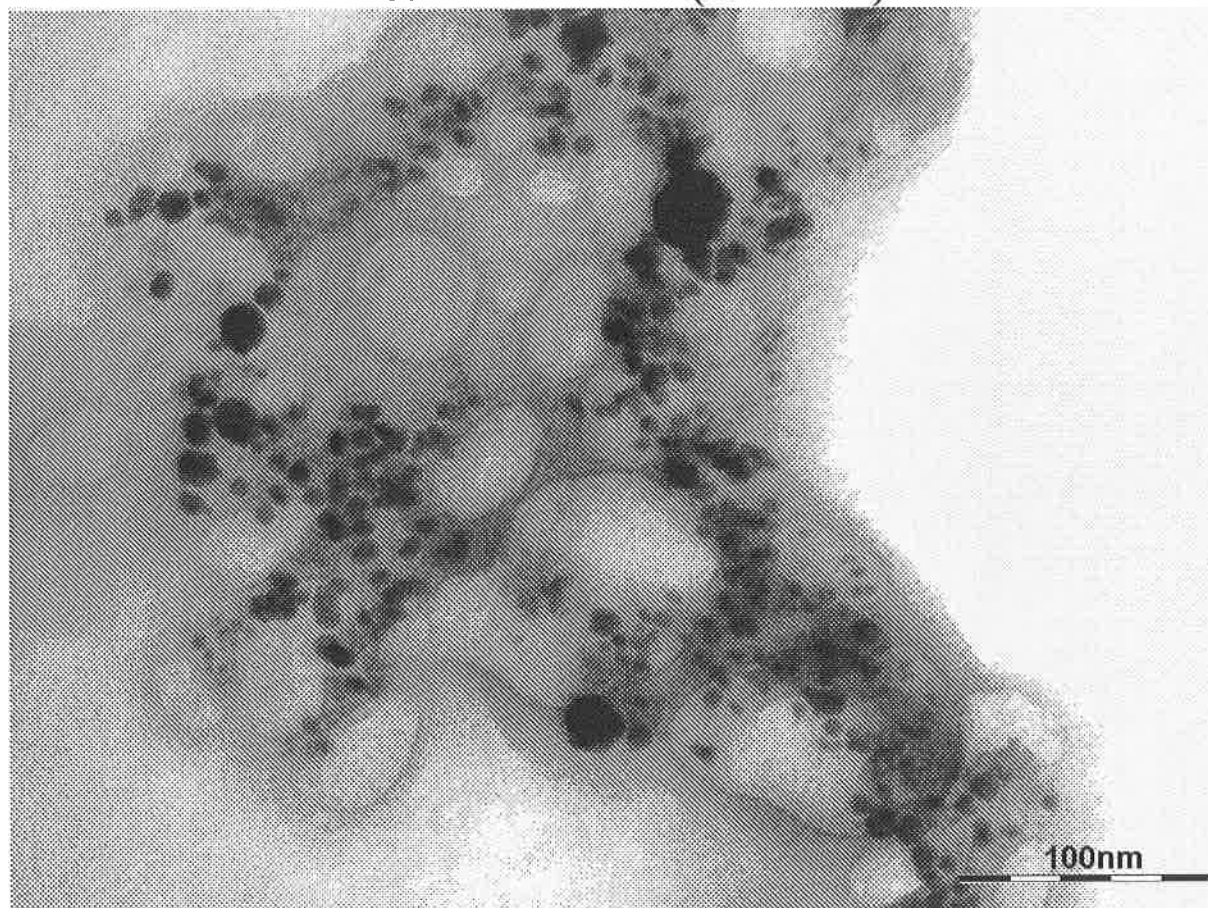
ElectraClear Gold (EC63010)

Figure 90a

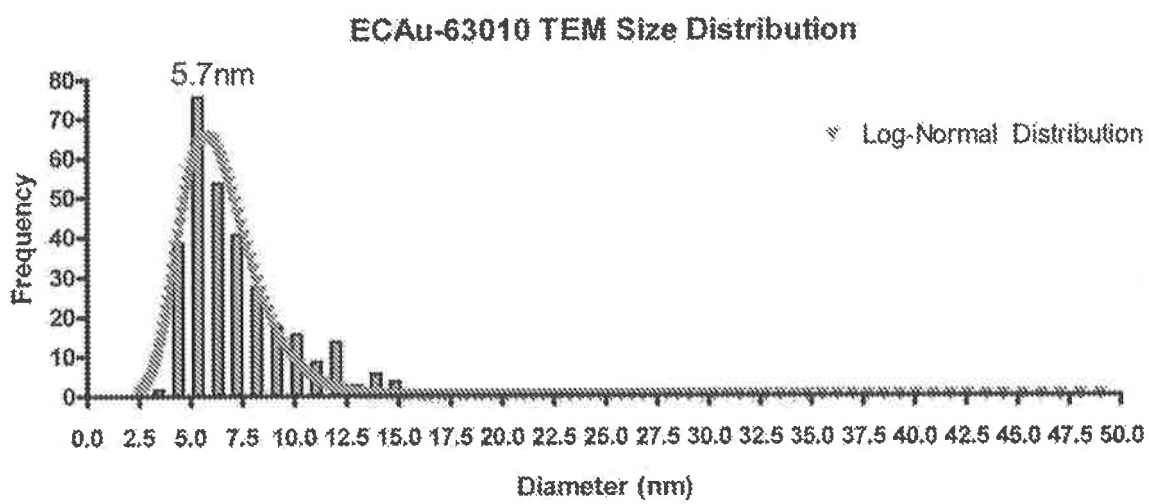


Figure 90b

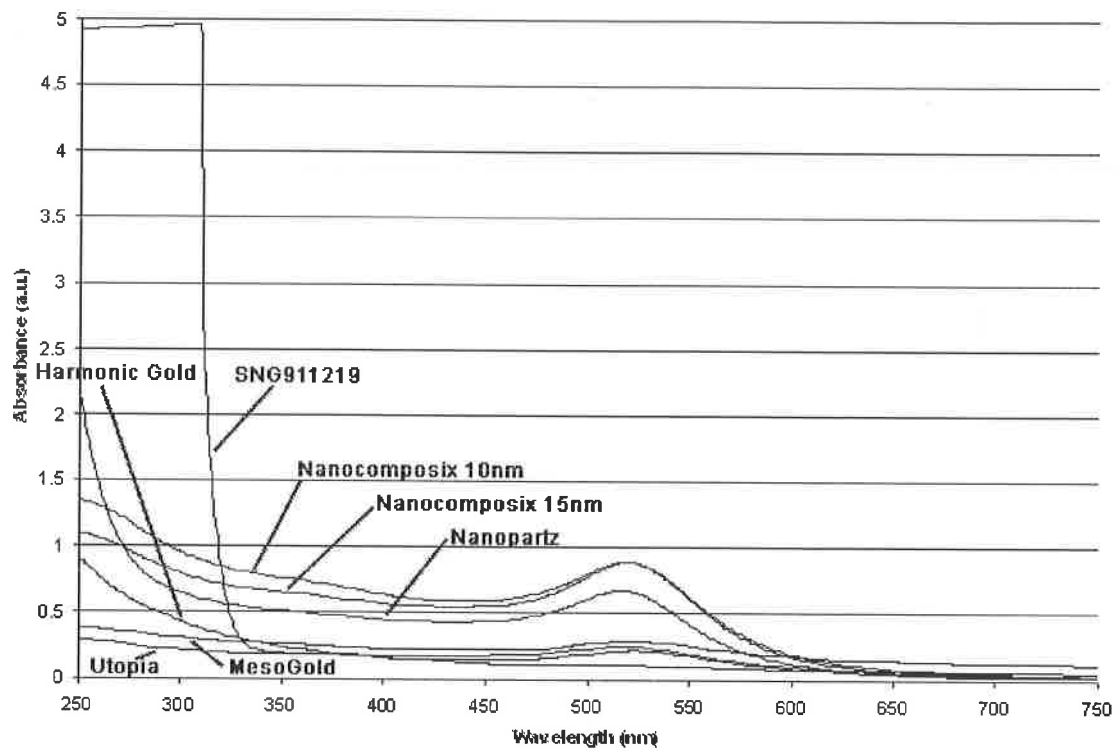


Figure 90c

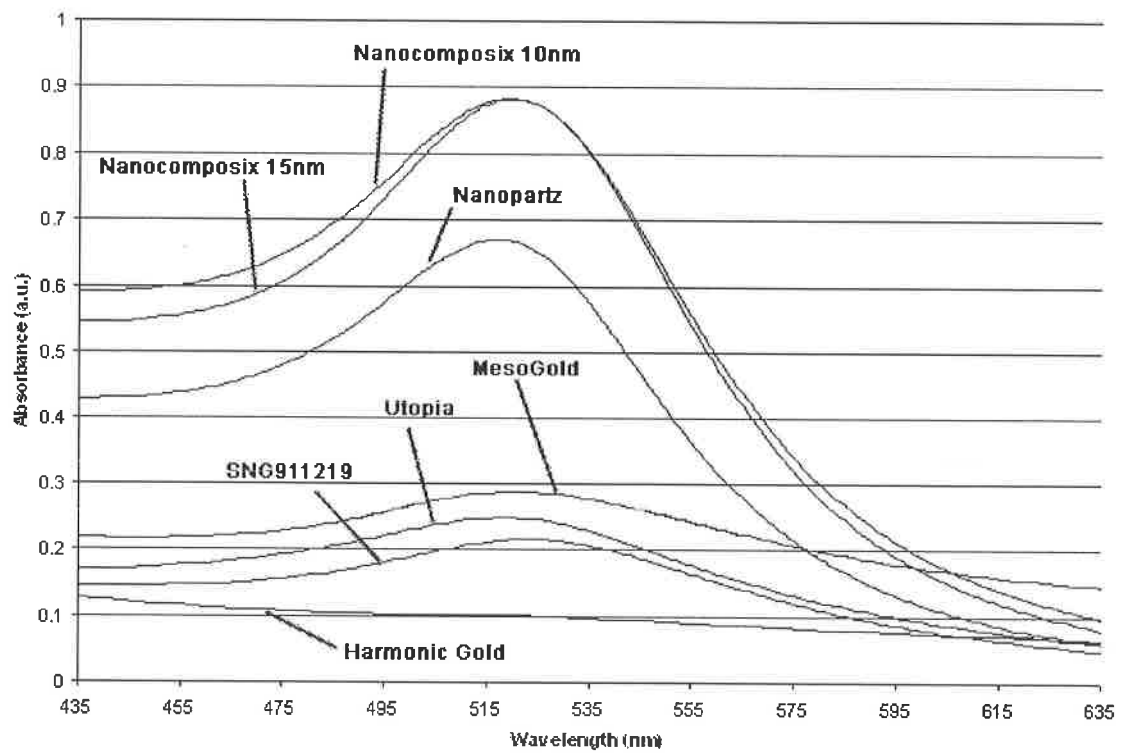


Figure 90d

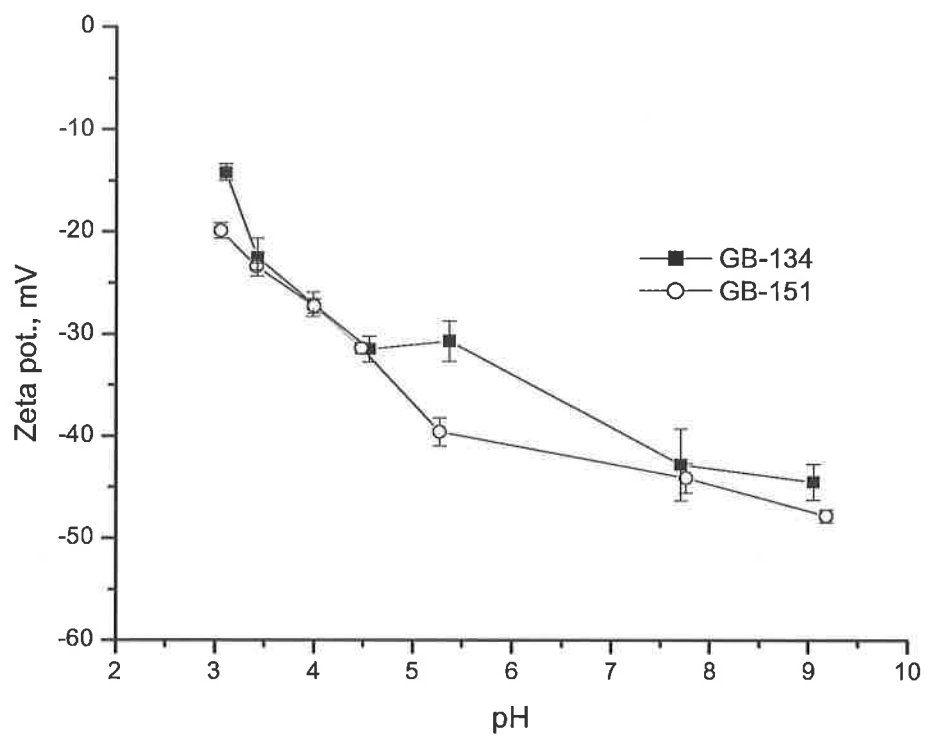


Figure 91

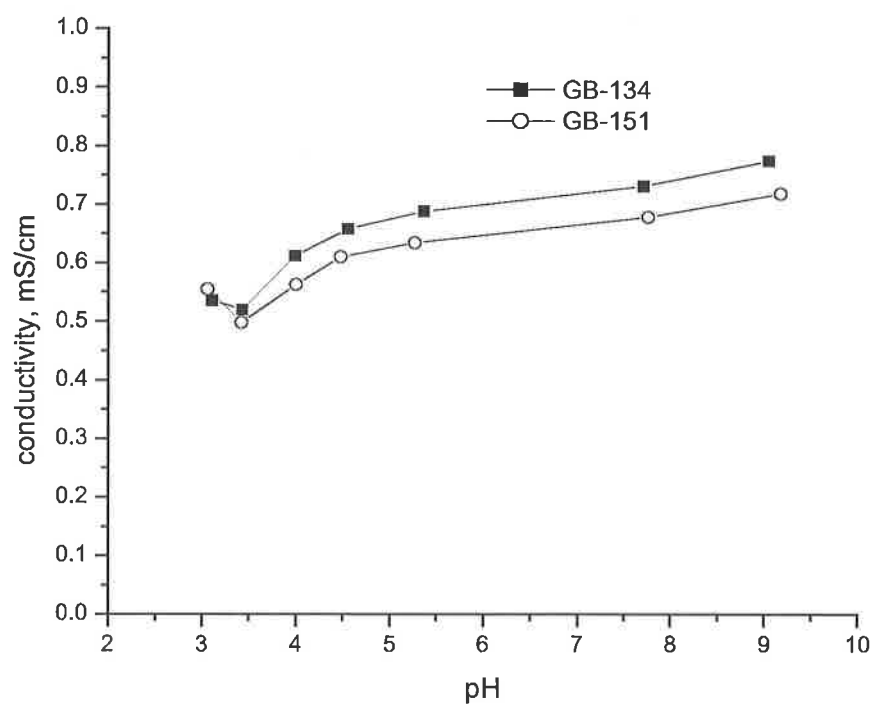


Figure 92.

GD-006-01
29.00% transmission

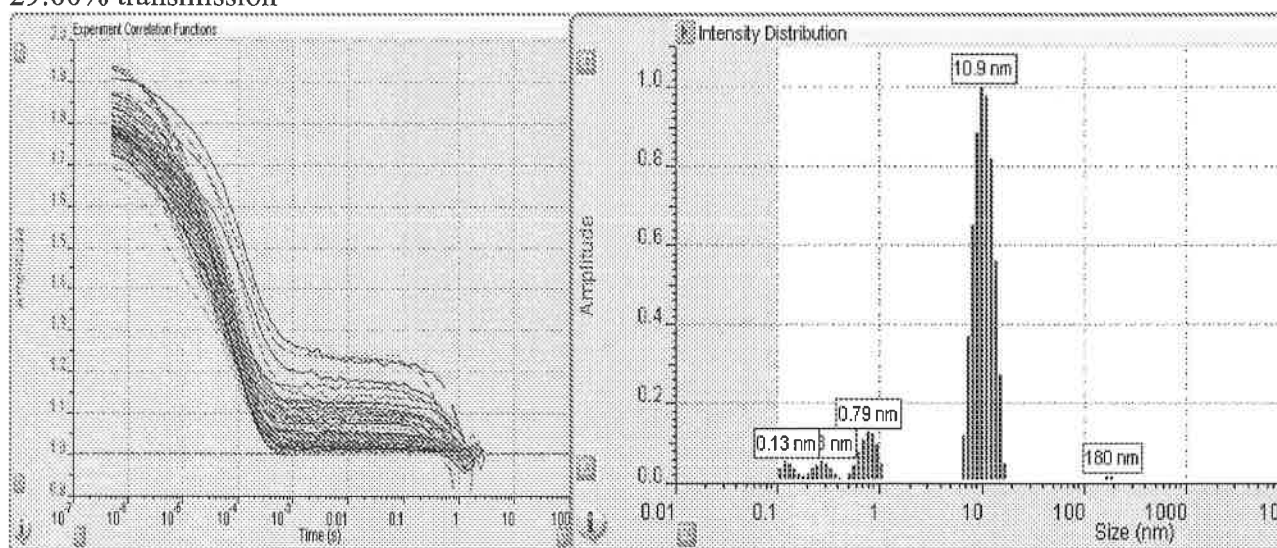
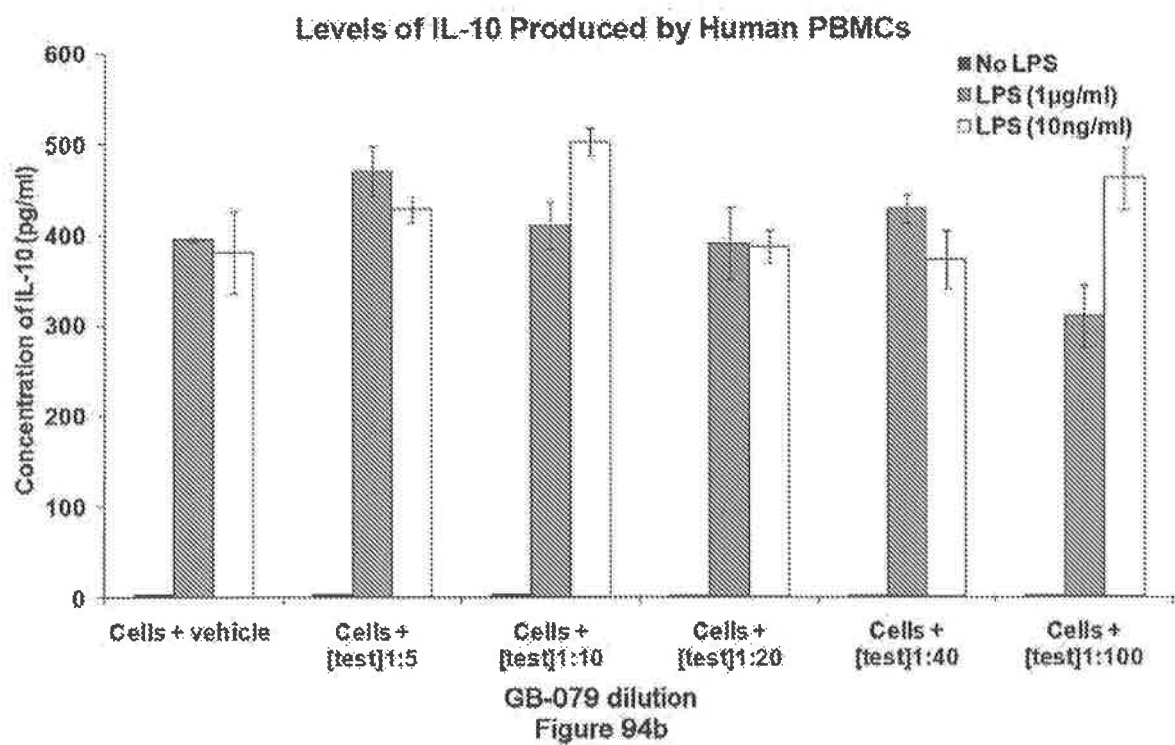
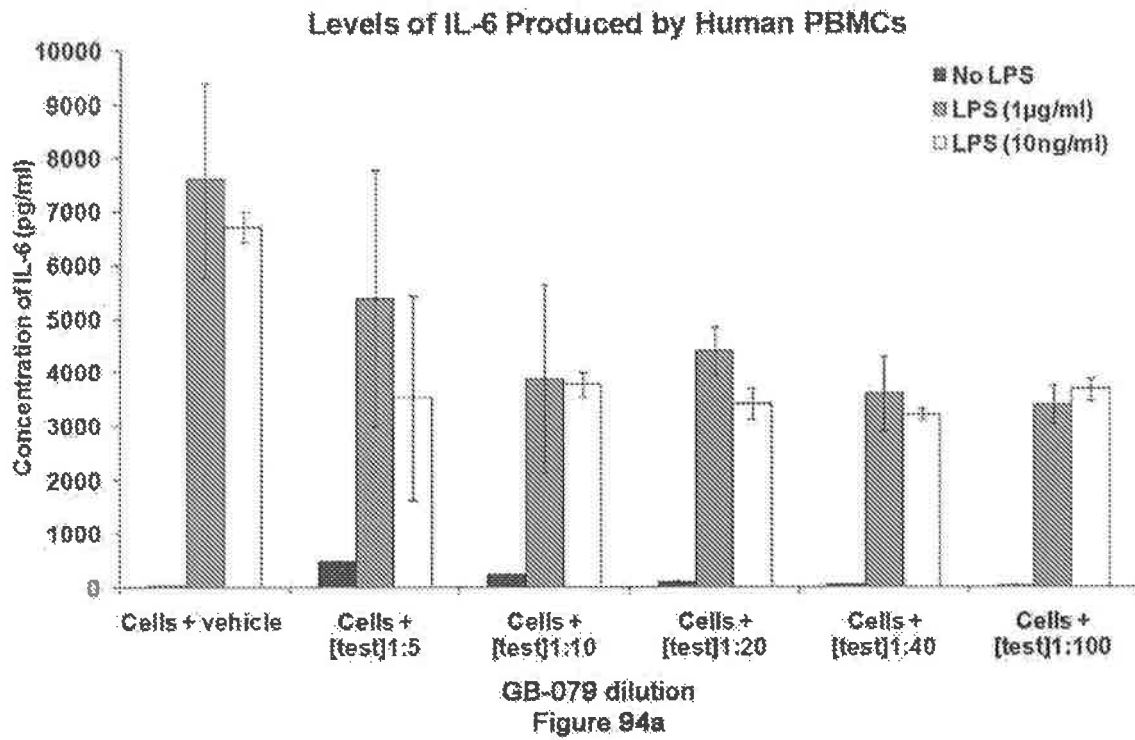
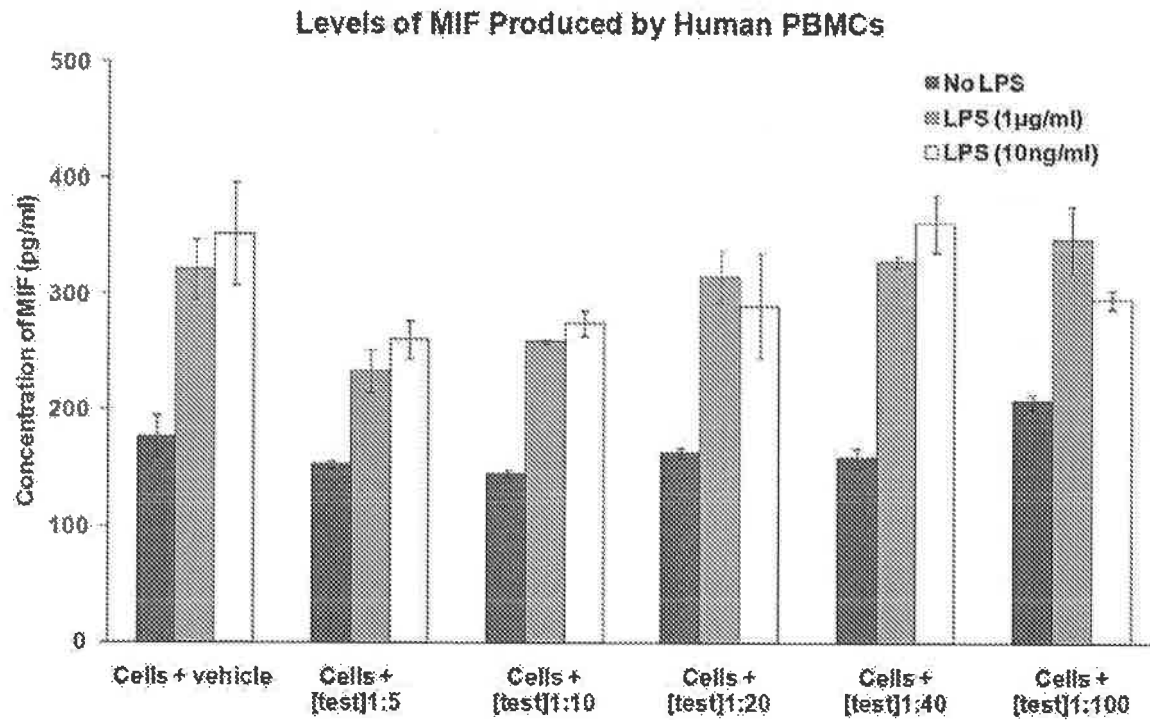
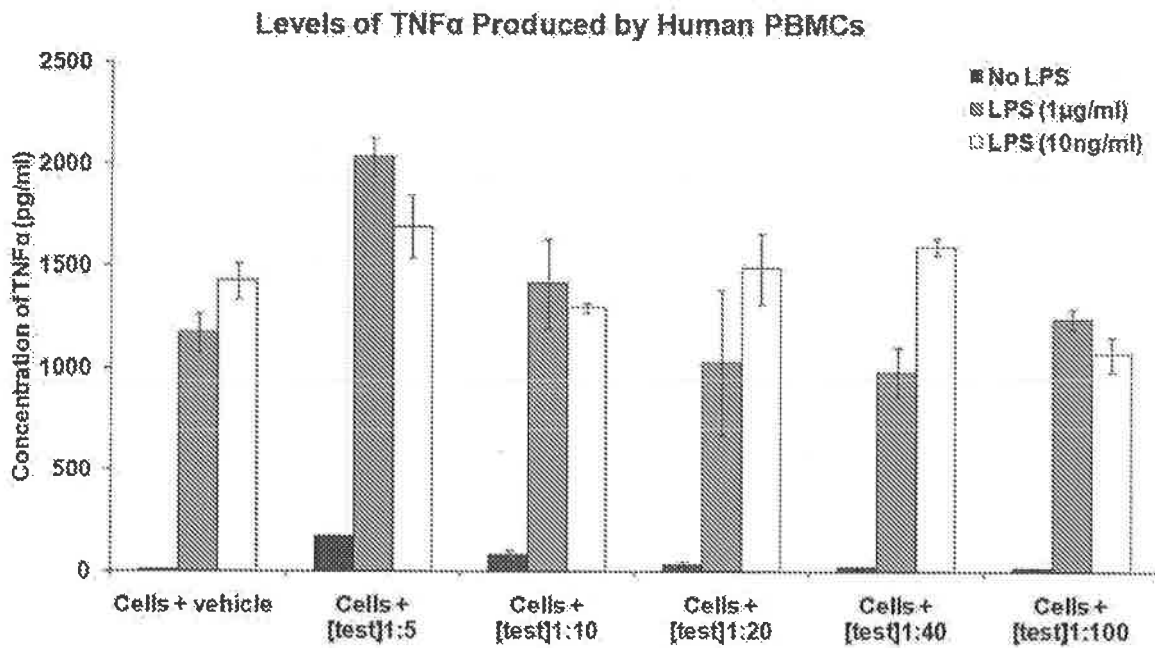


Figure 93





GB-079 dilution
Figure 94c



GB-079 dilution
Figure 94d

Figure 95
Collagen Induced Arthritis in Mice
(Clinical Limb Scores)

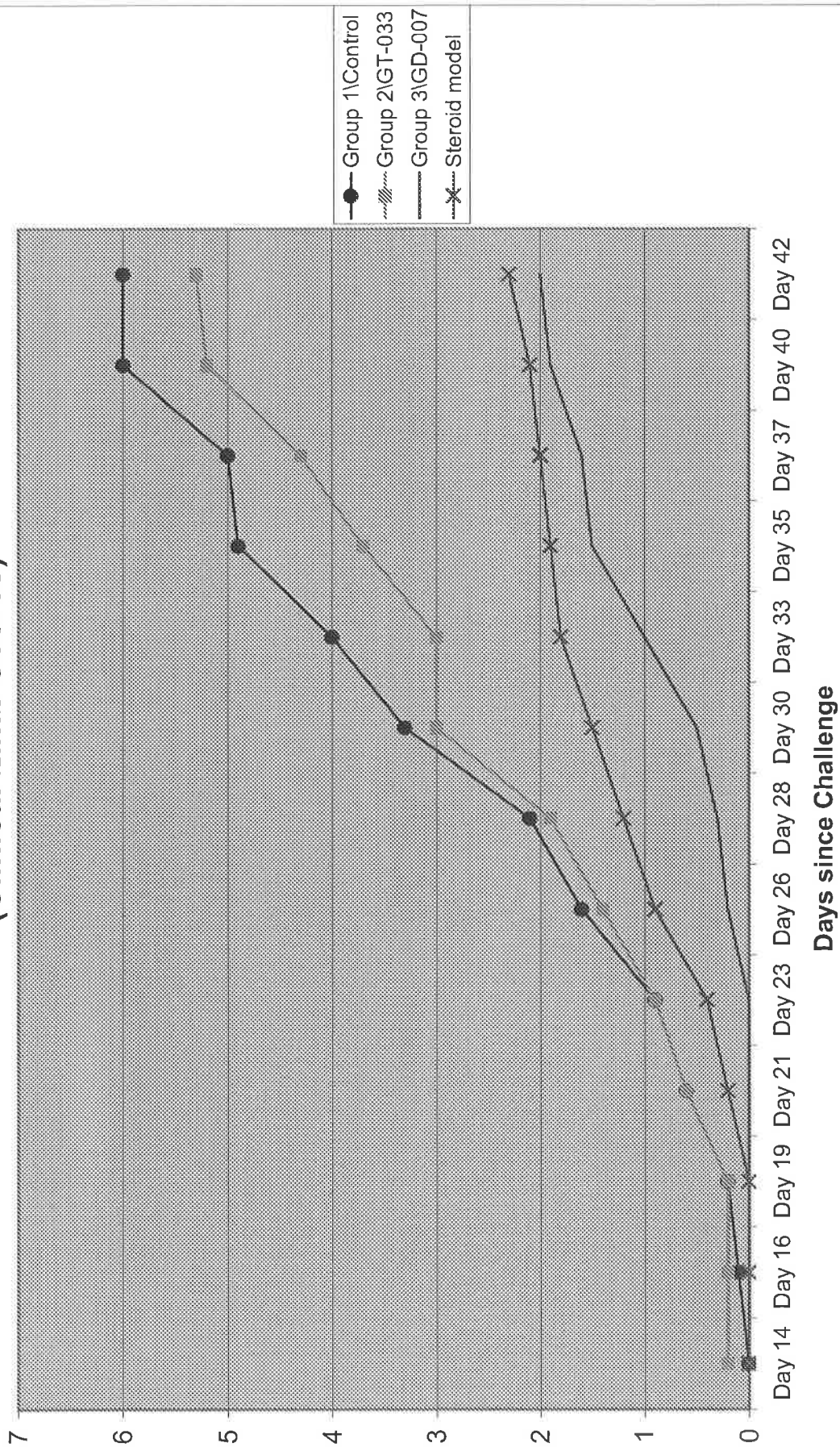




Figure 96a
(Normal joint)

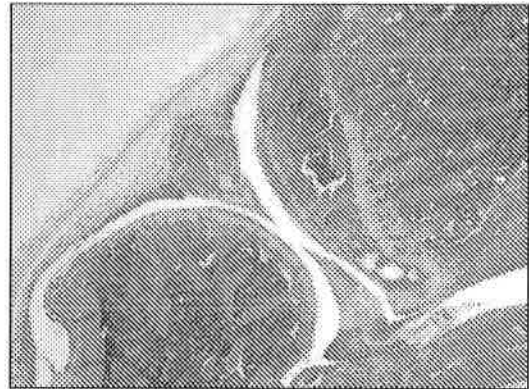


Figure 96b
(Grade 1)



Figure 96c
(Grade 2)

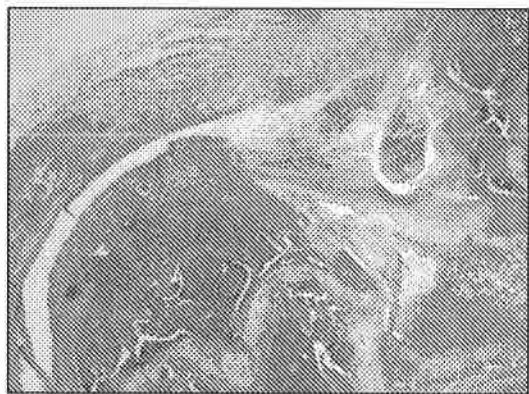


Figure 96d
(Grade 3)

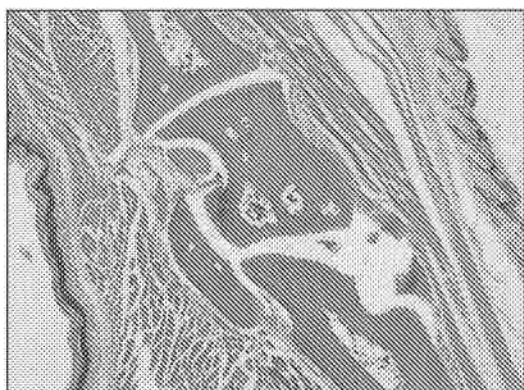


Figure 97a
(Grade 0)

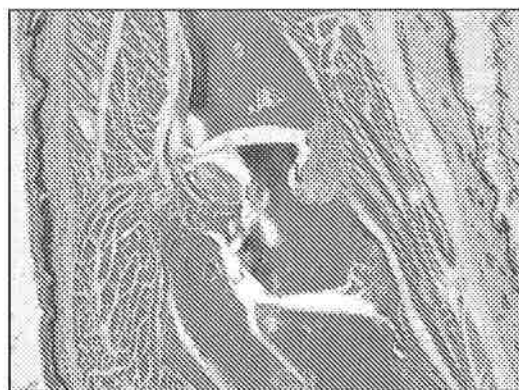


Figure 97b
(Grade 1)



Figure 97c
(Grade 4)



Figure 97d
(Grade 7)

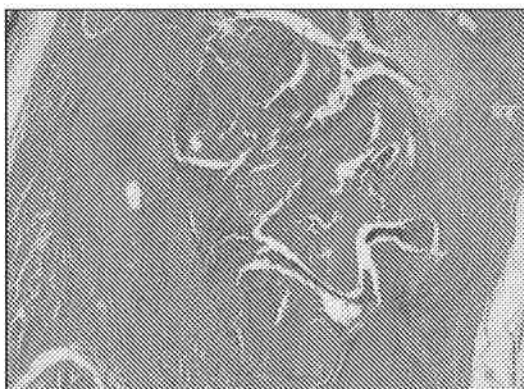


Figure 97e
(Grade 9)

EAE Cumulative Disease Incidence

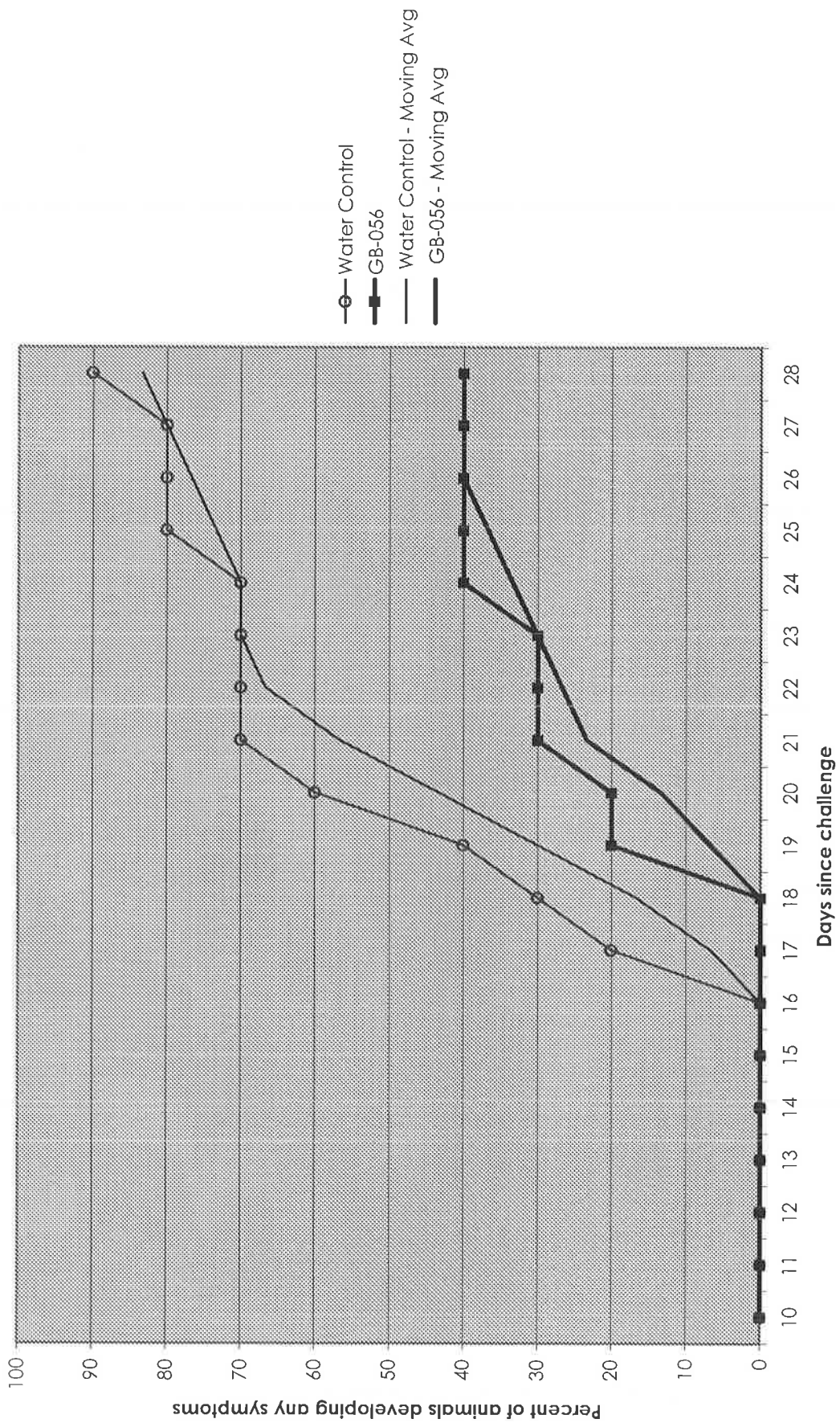
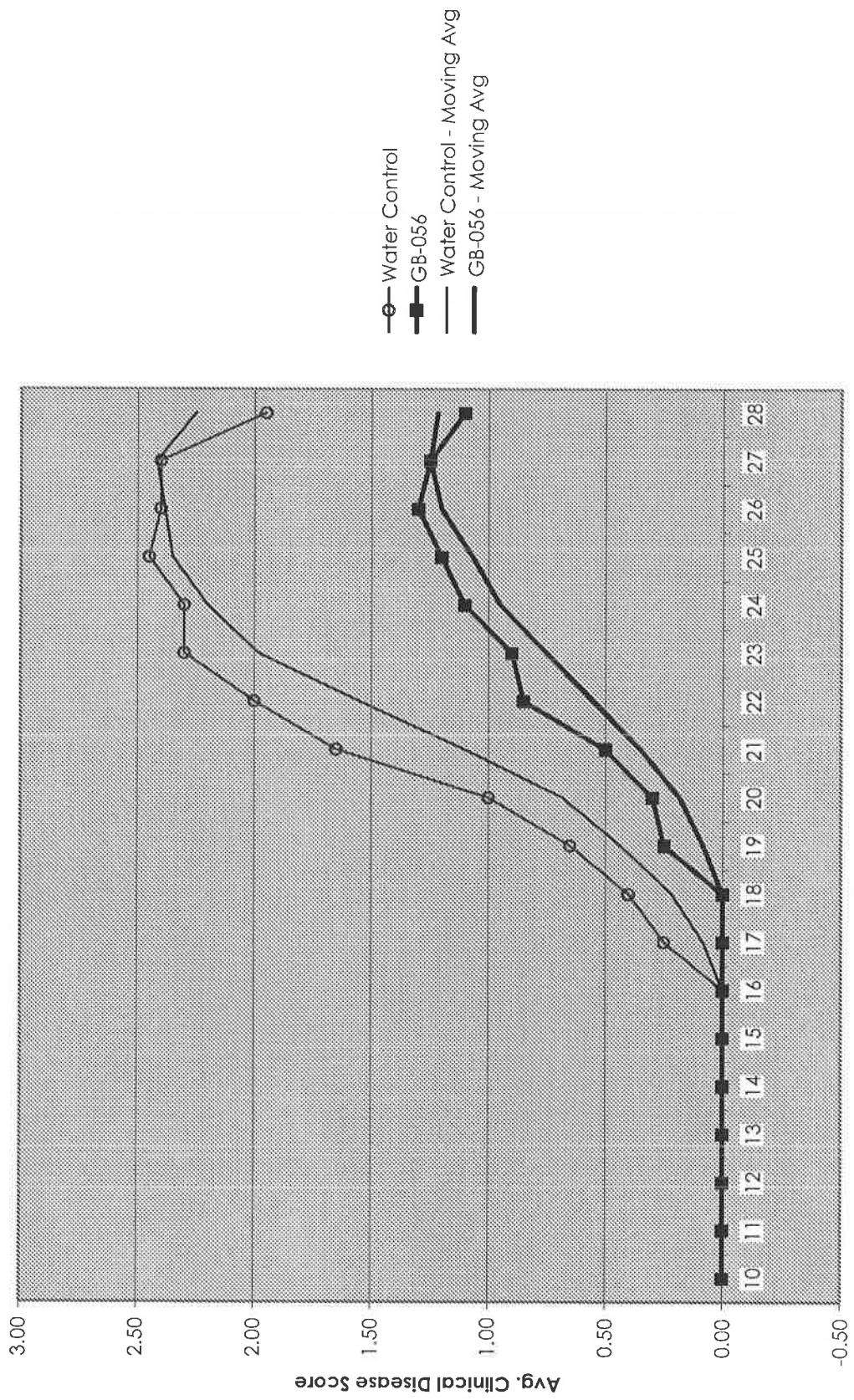


Figure 98

EAE in Mice (MS model)



Days since challenge

Figure 99

GB-056:

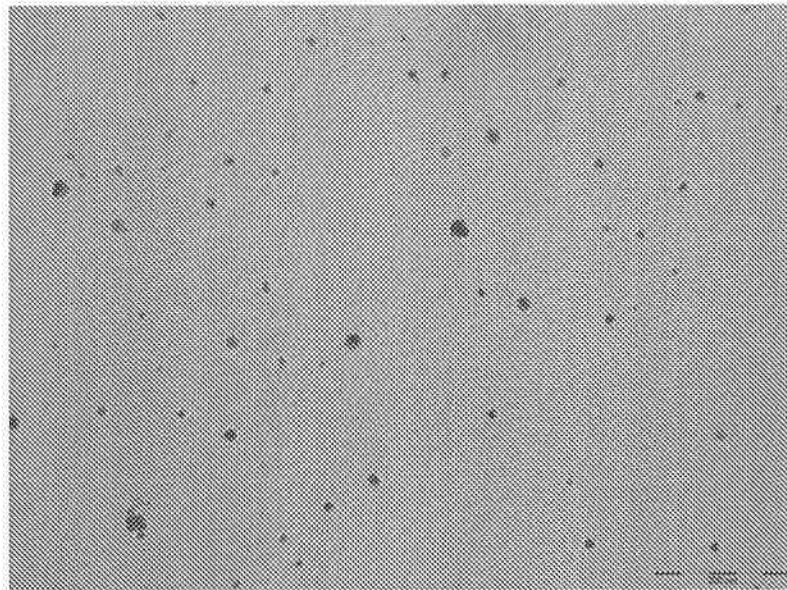


Figure 100a

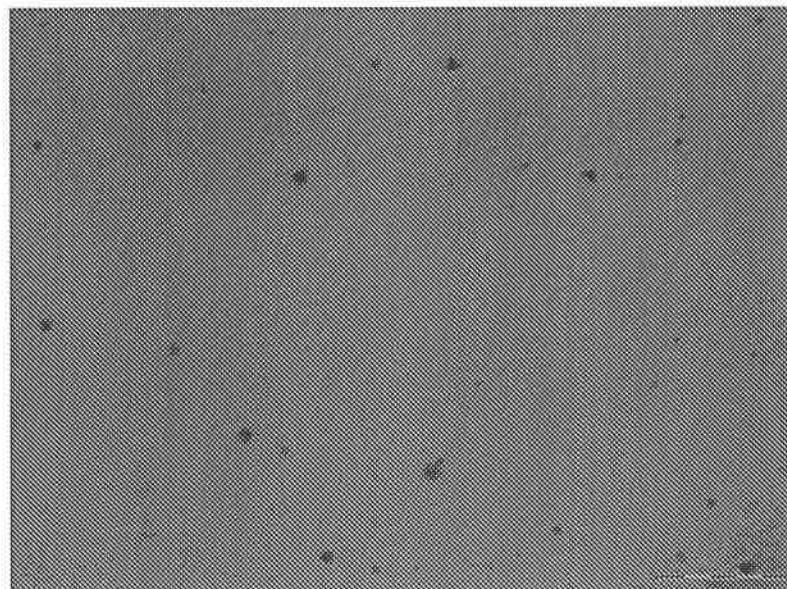


Figure 100b

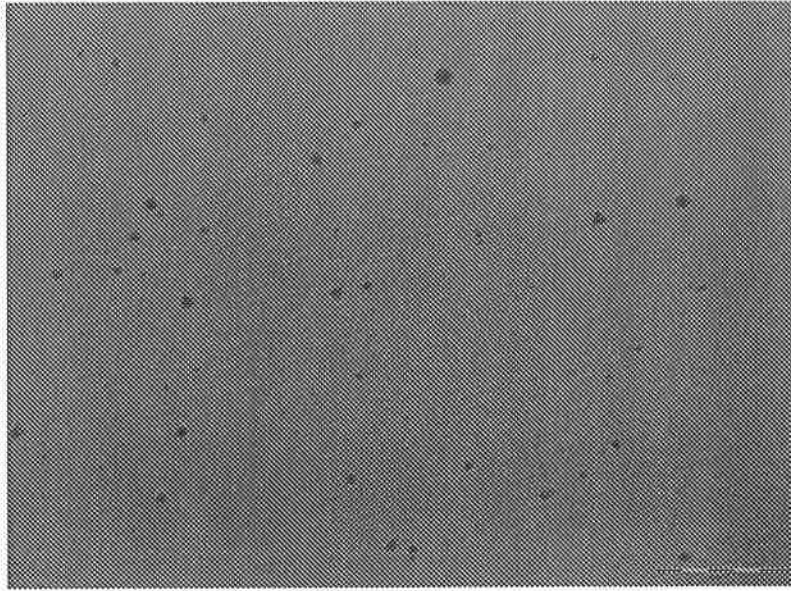


Figure 100c

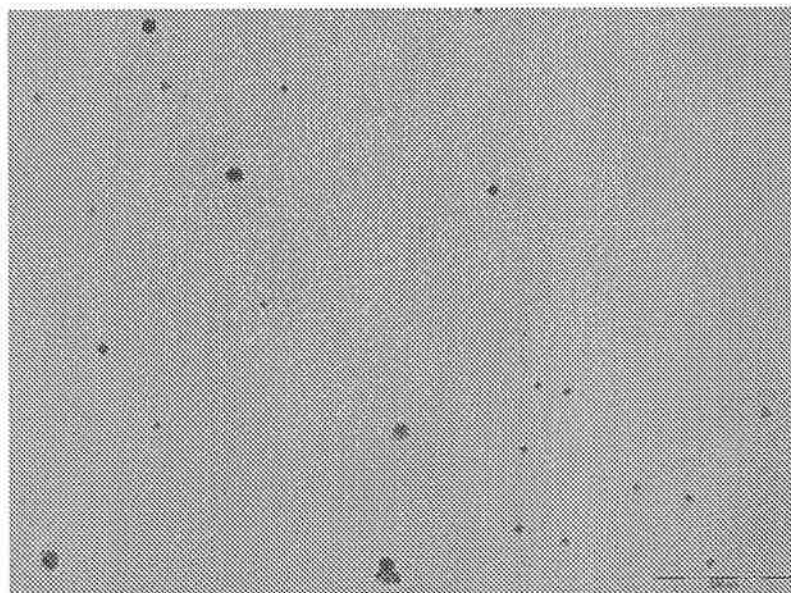


Figure 100d

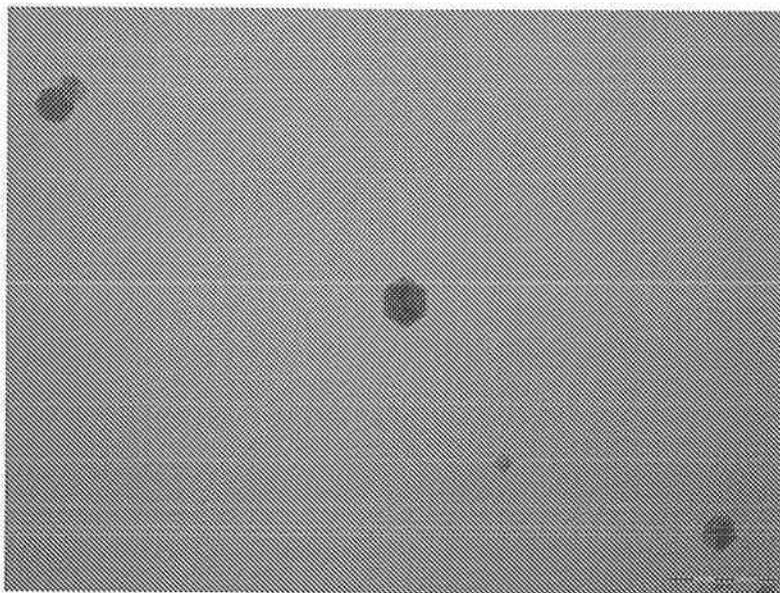


Figure 100e

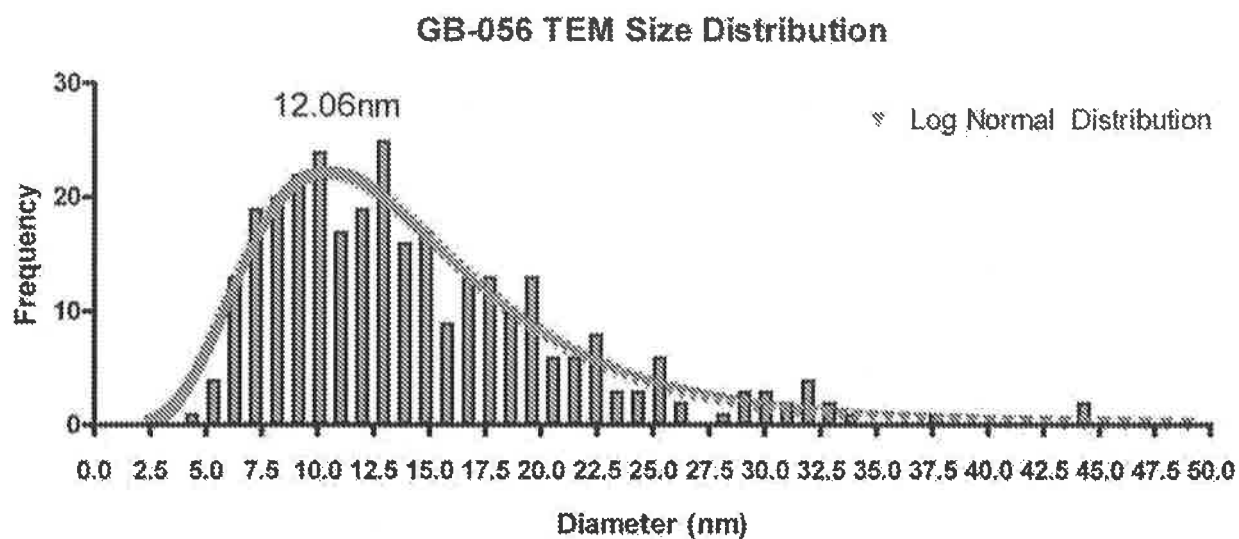


Figure 101a

Gold GB-056 DLS Size Distribution
10.02% transmission

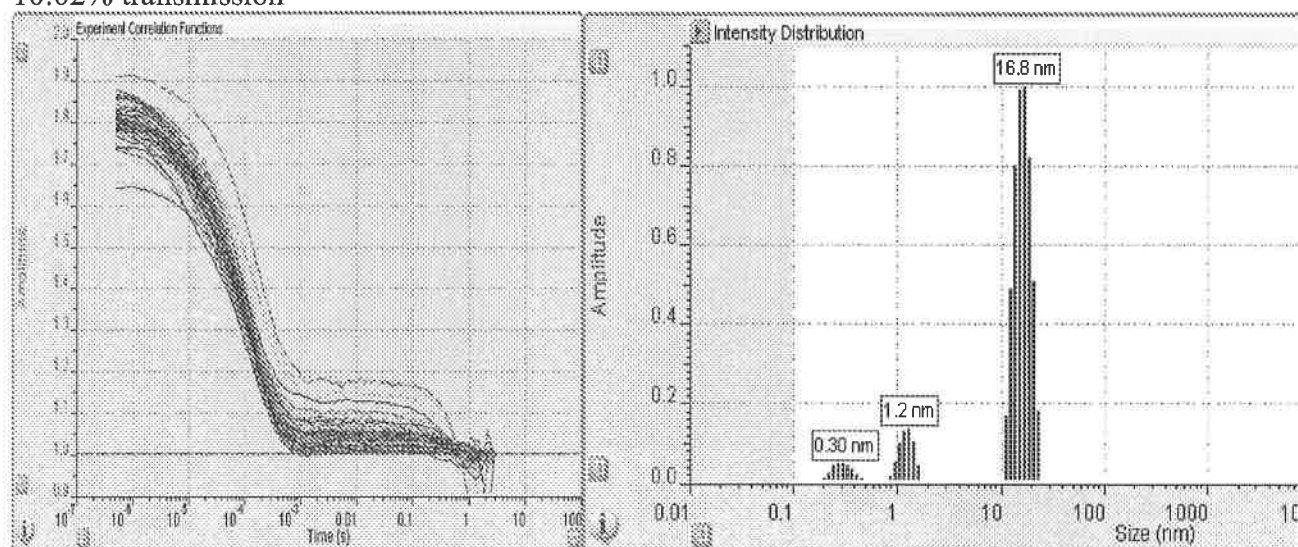


Figure 101b

GB-056: Day 2 – Day 3

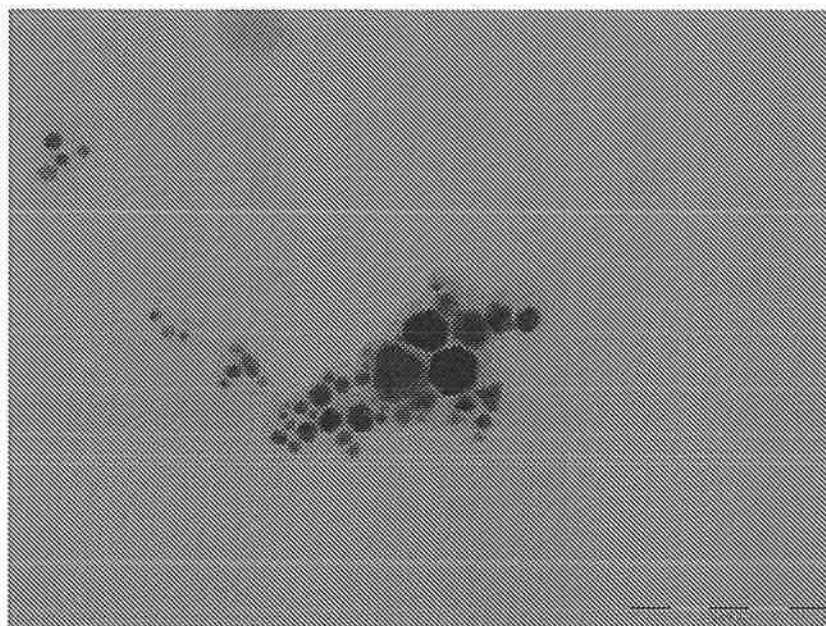


Figure 102a

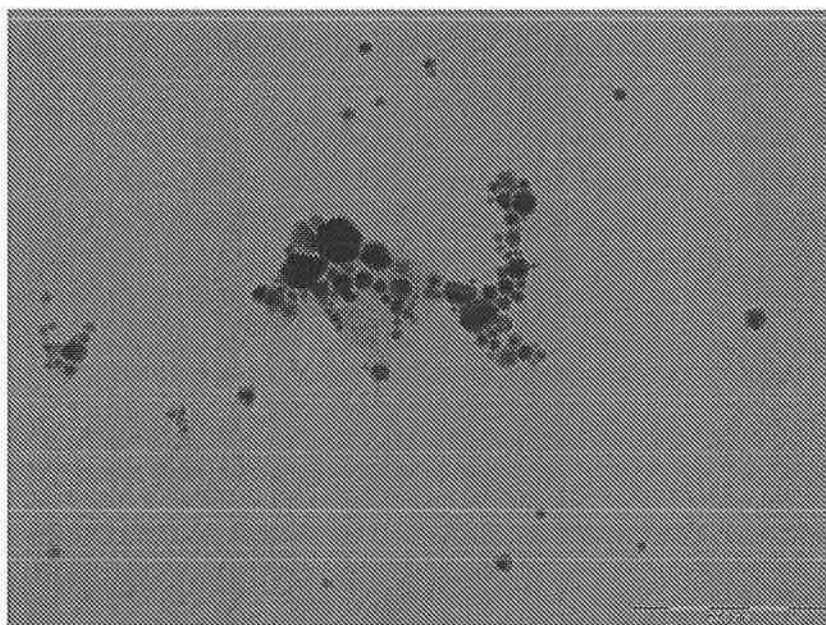


Figure 102b

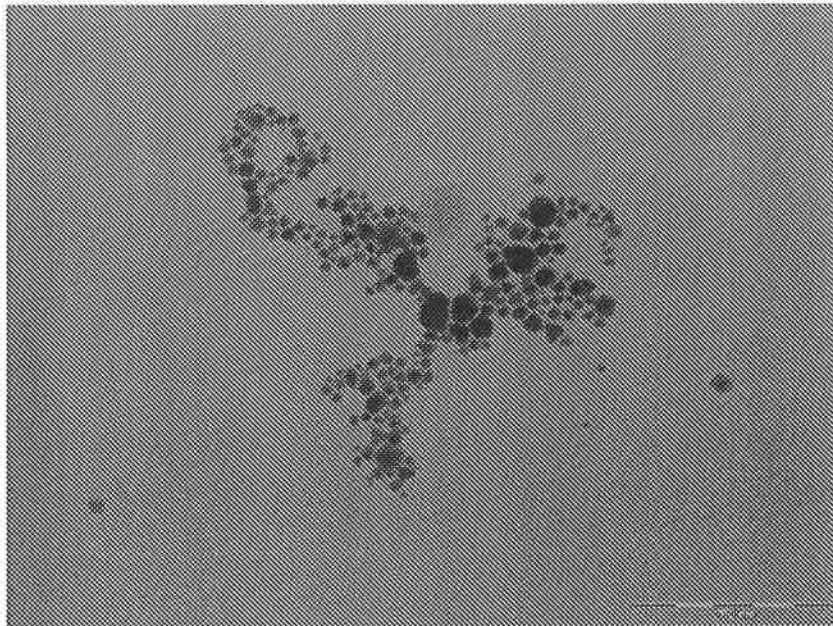


Figure 102c

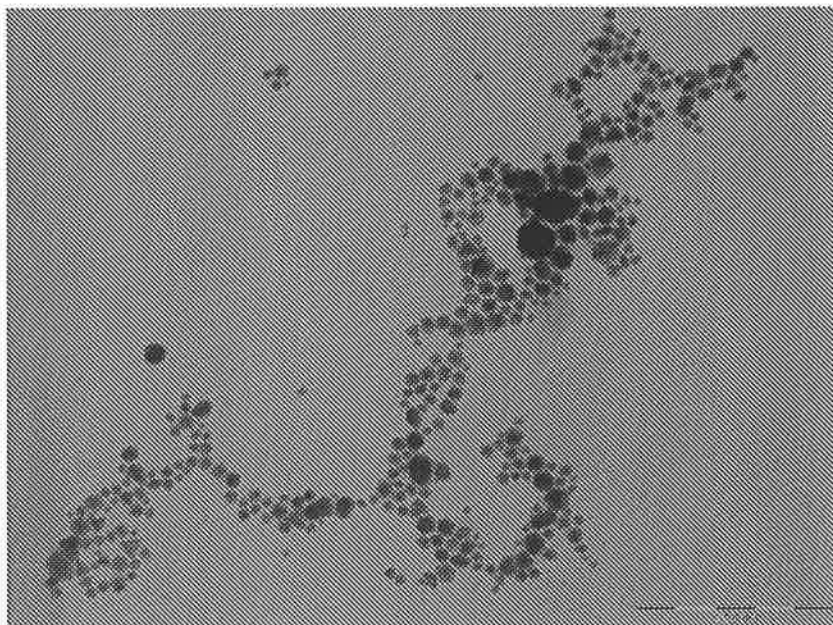


Figure102d

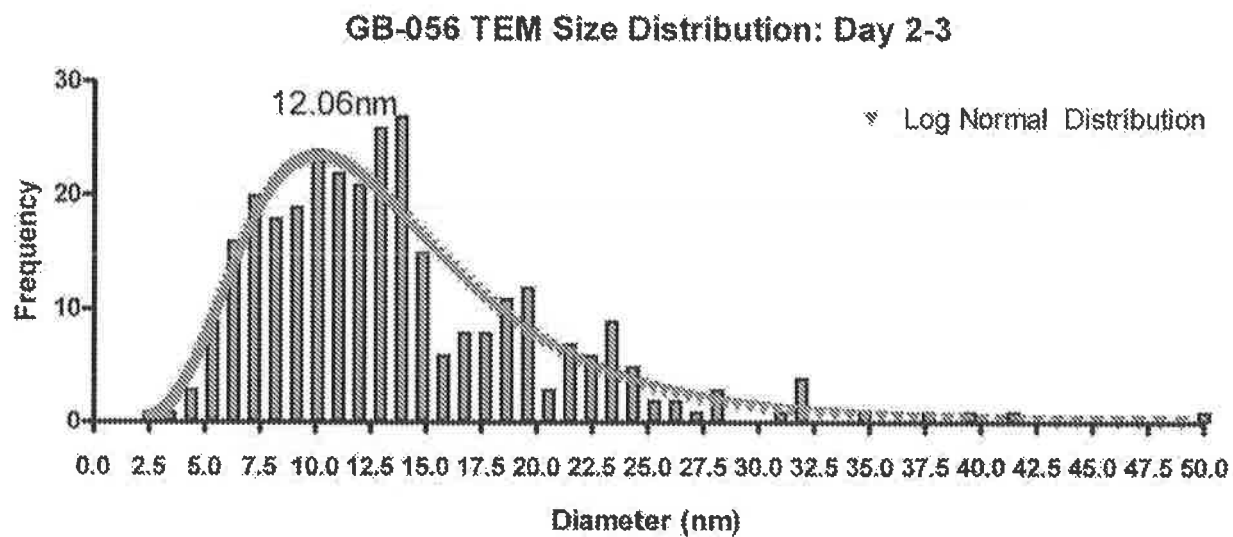


Figure 103a

GB-056 DLS Size Distribution: Day 2 – Day 3
5.34% transmission

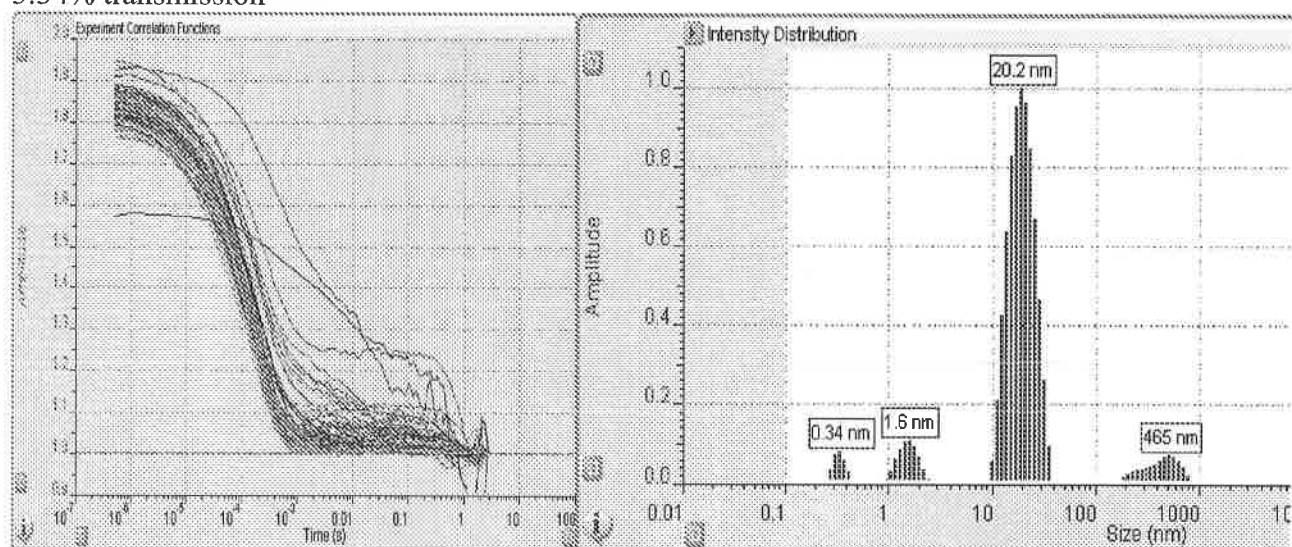


Figure 103b

GB-056: Day 4 – Day 5

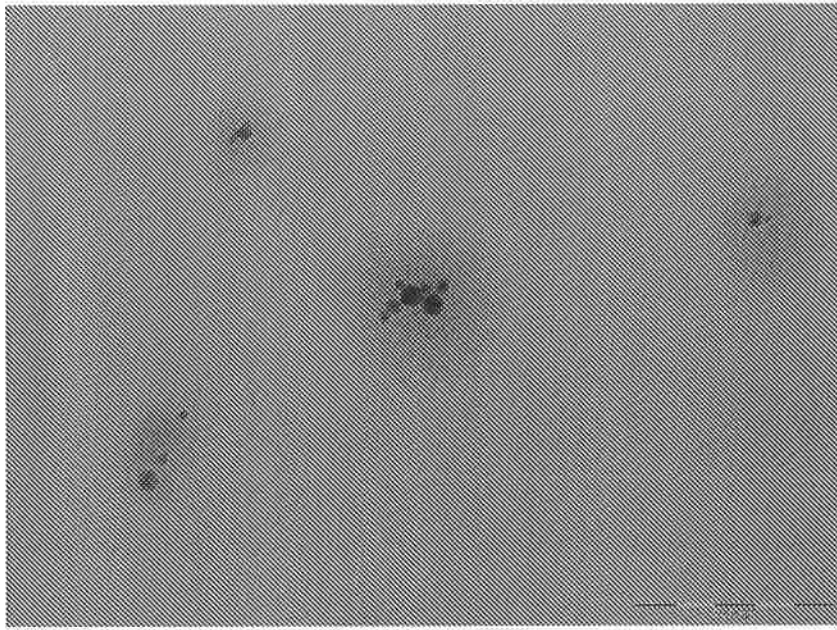


Figure 104a

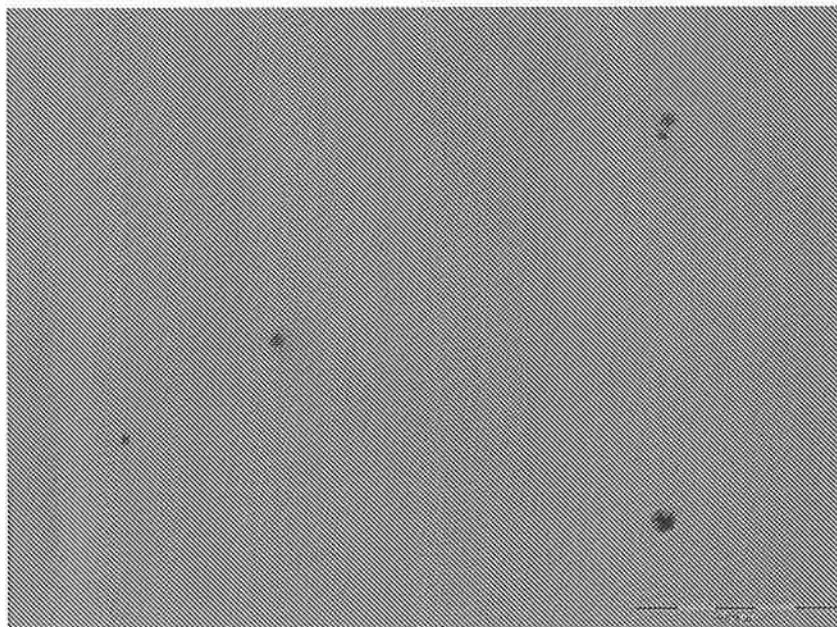


Figure 104b

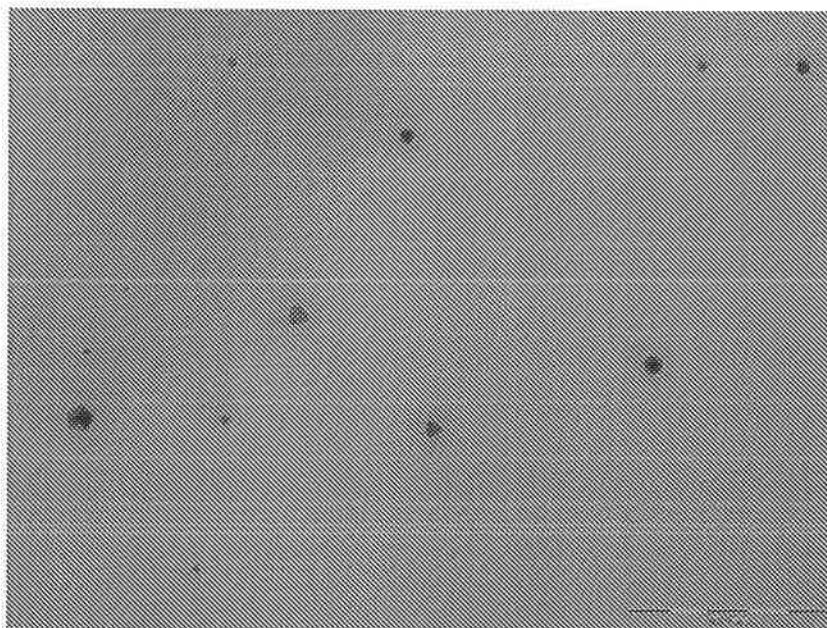


Figure 104c

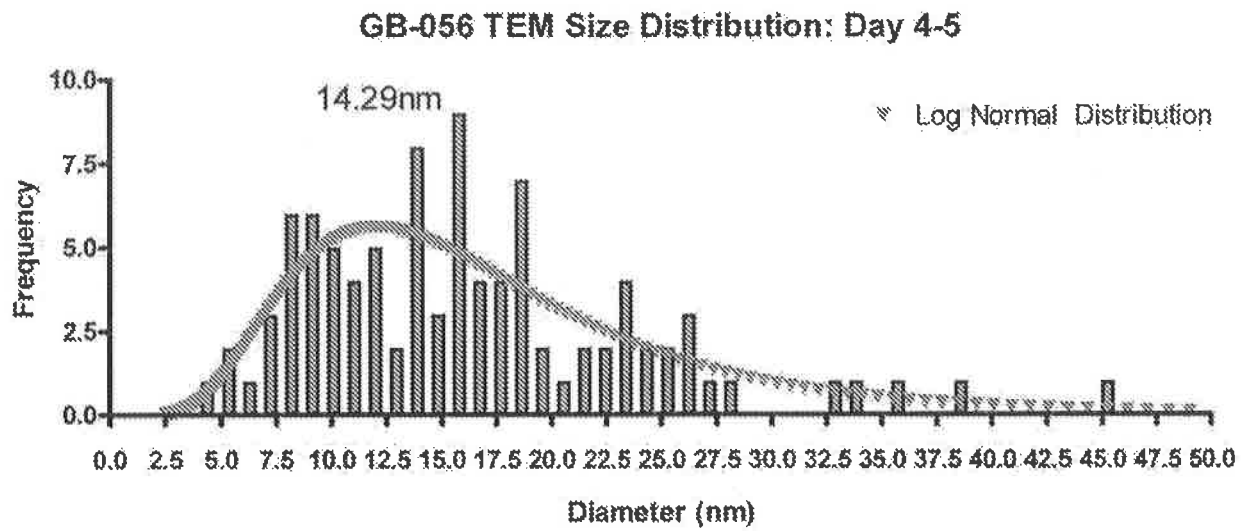


Figure 105a

GB-056 DLS Size Distribution: Day 4 – Day 5
4.39% transmission

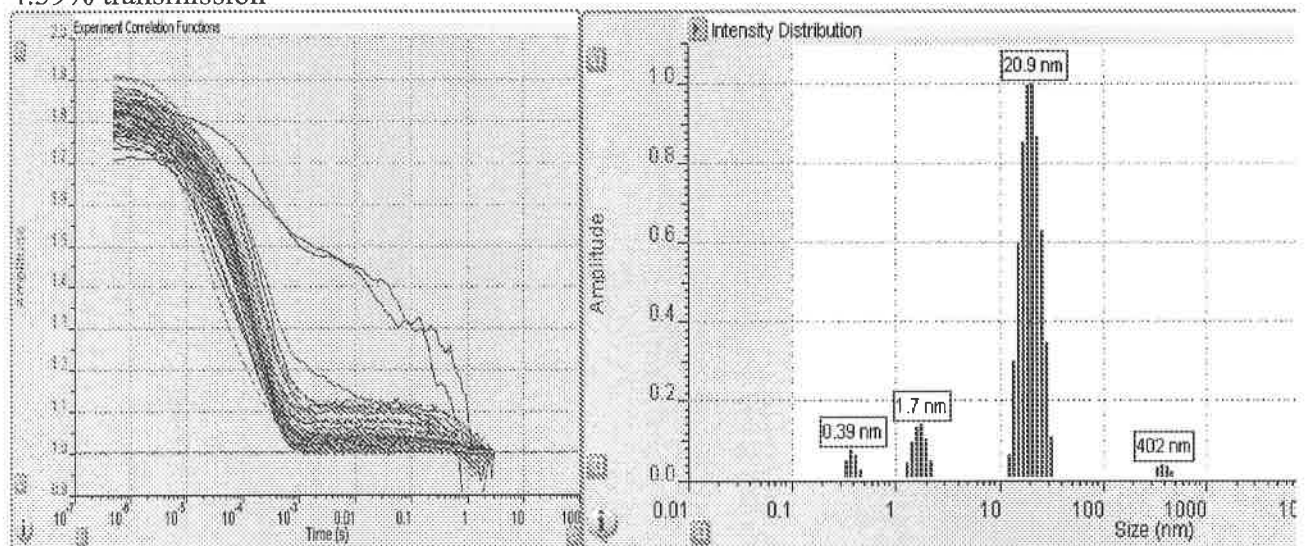


Figure 105b

Figure 106

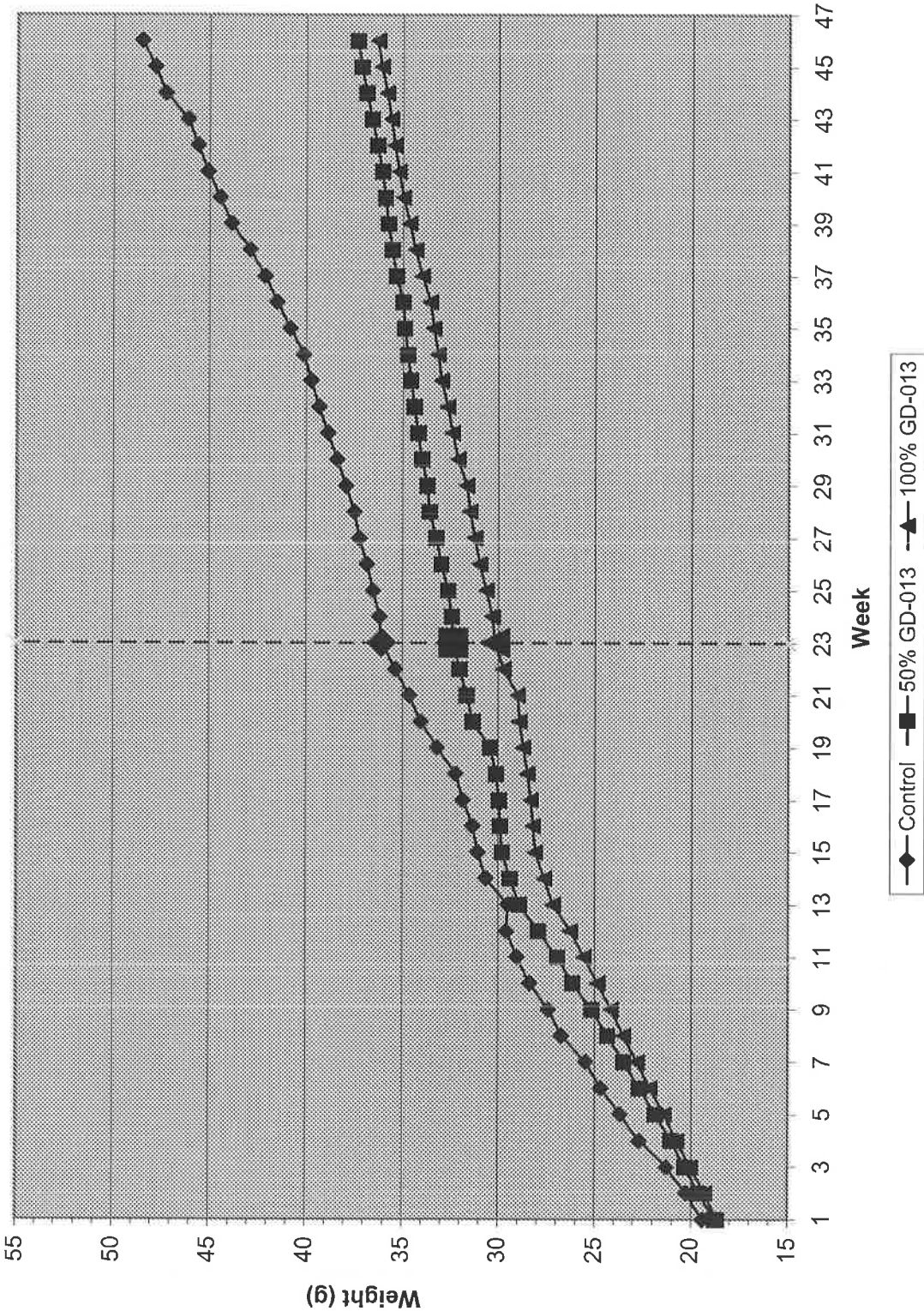
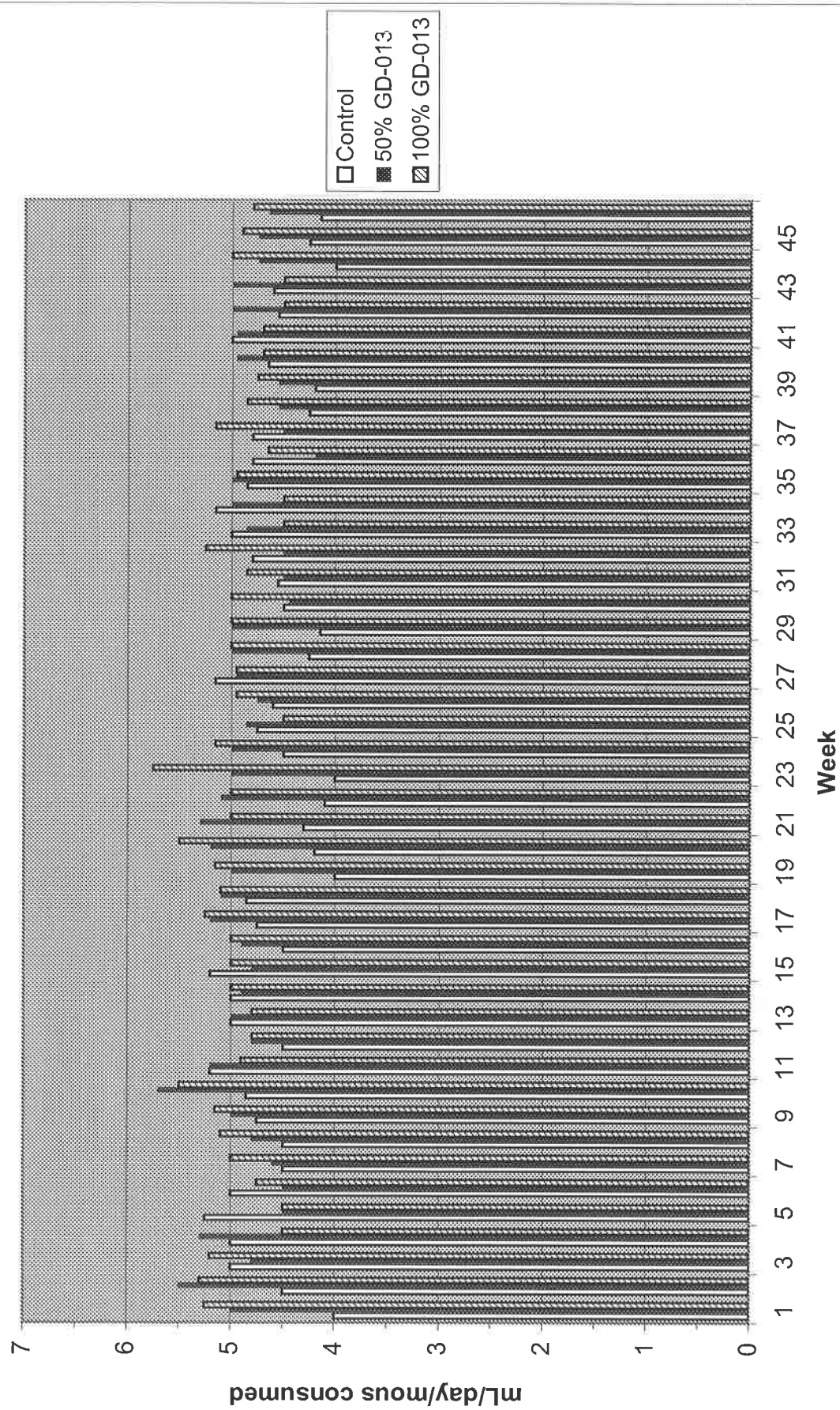


Figure 107



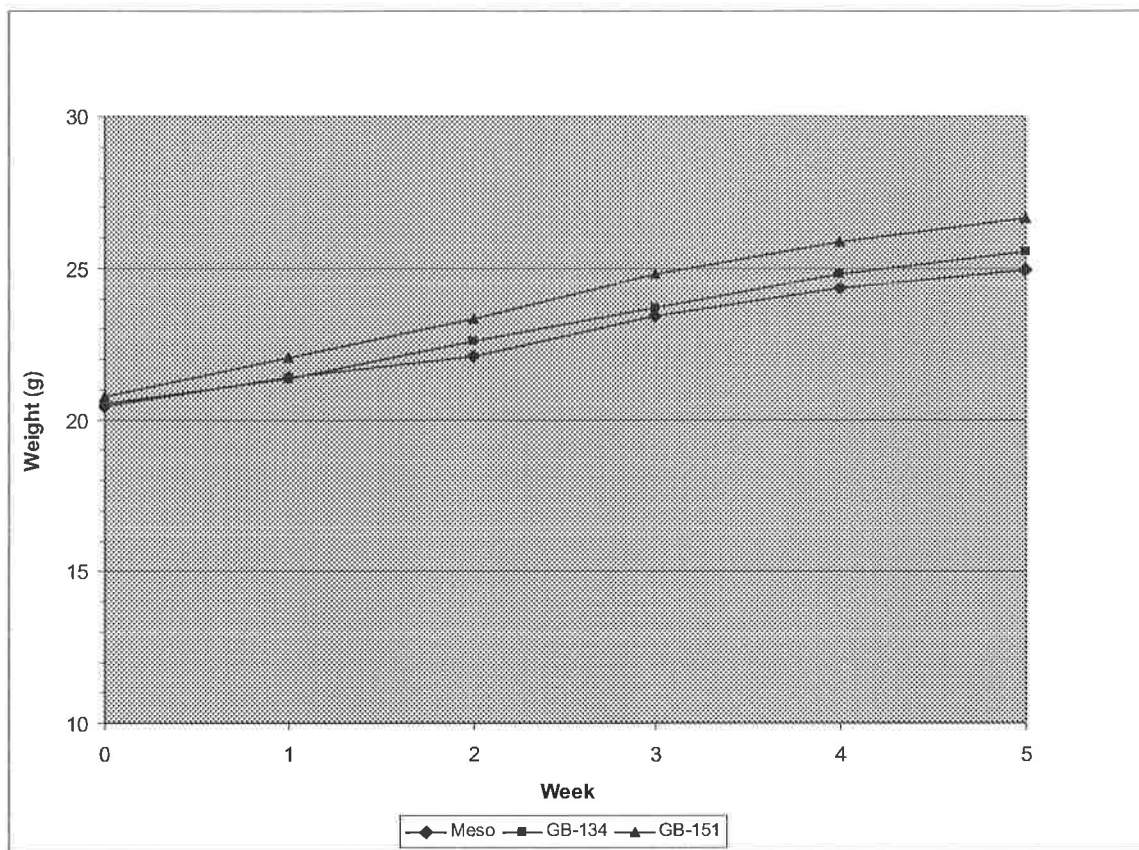


Figure 108

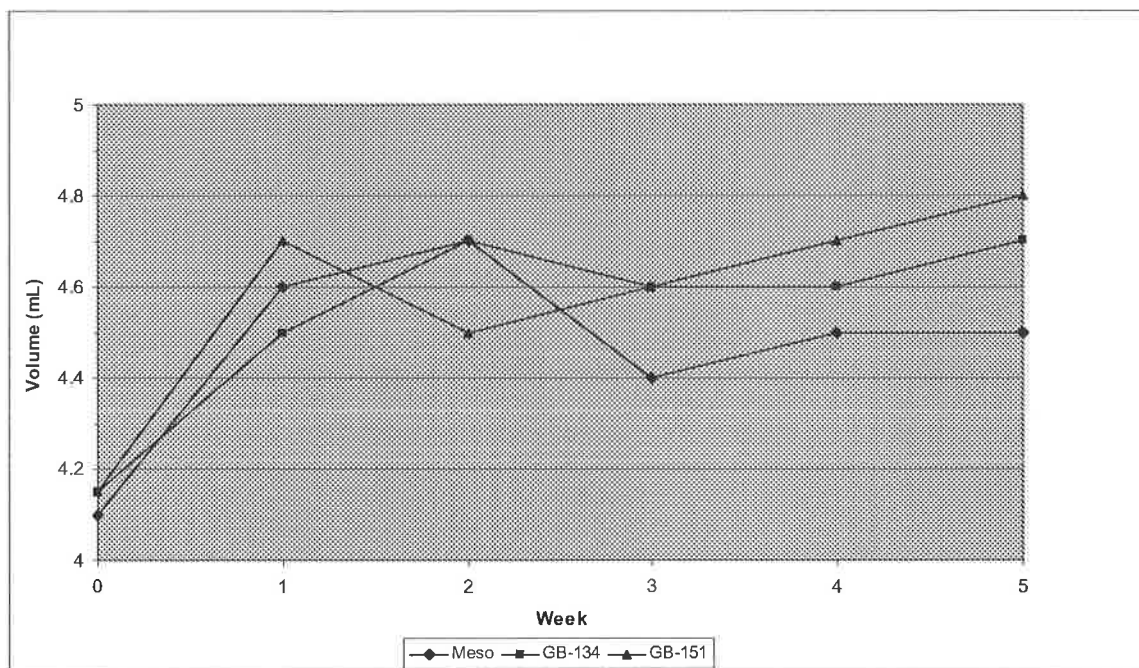


Figure 109

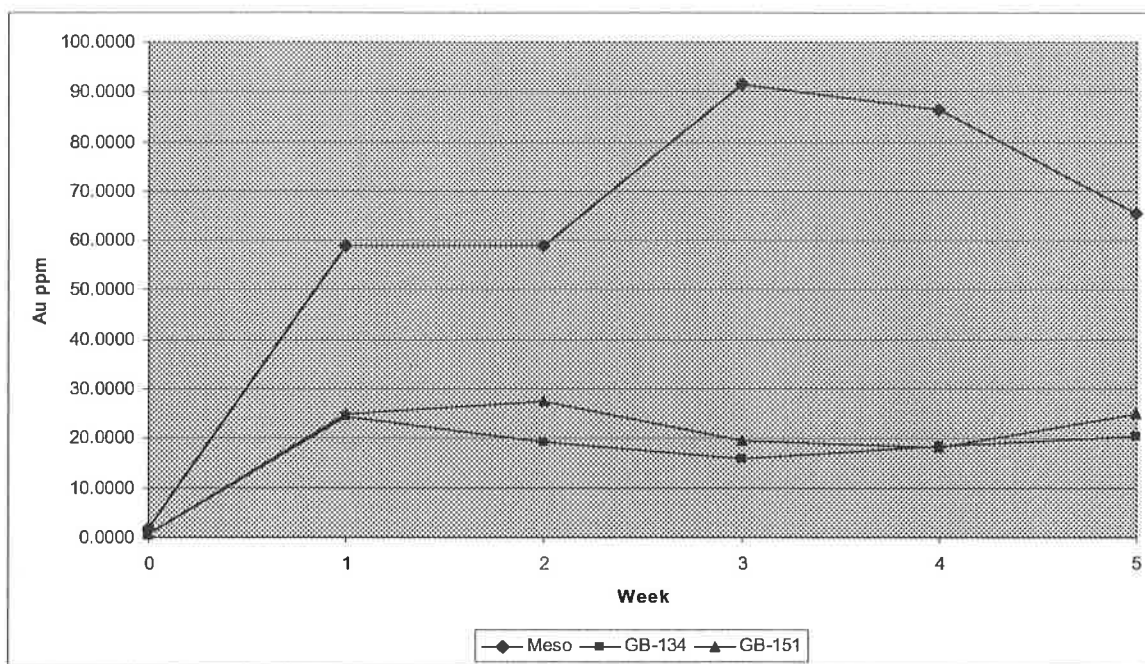


Figure 110

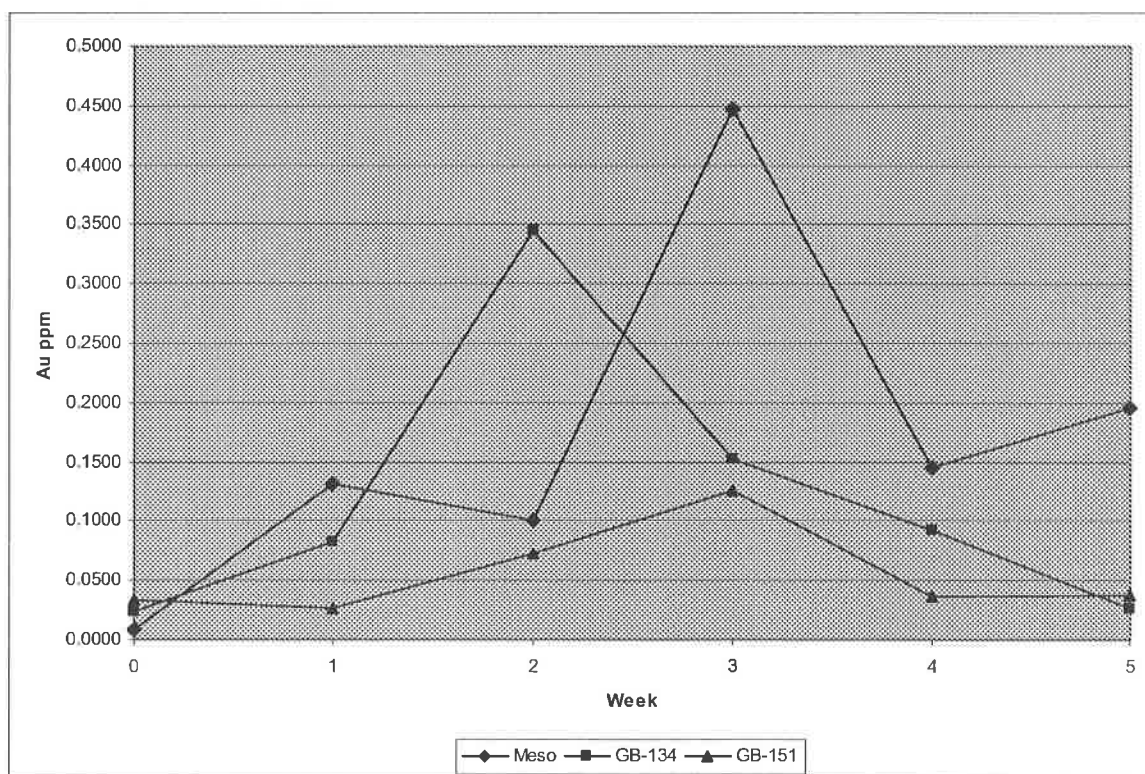
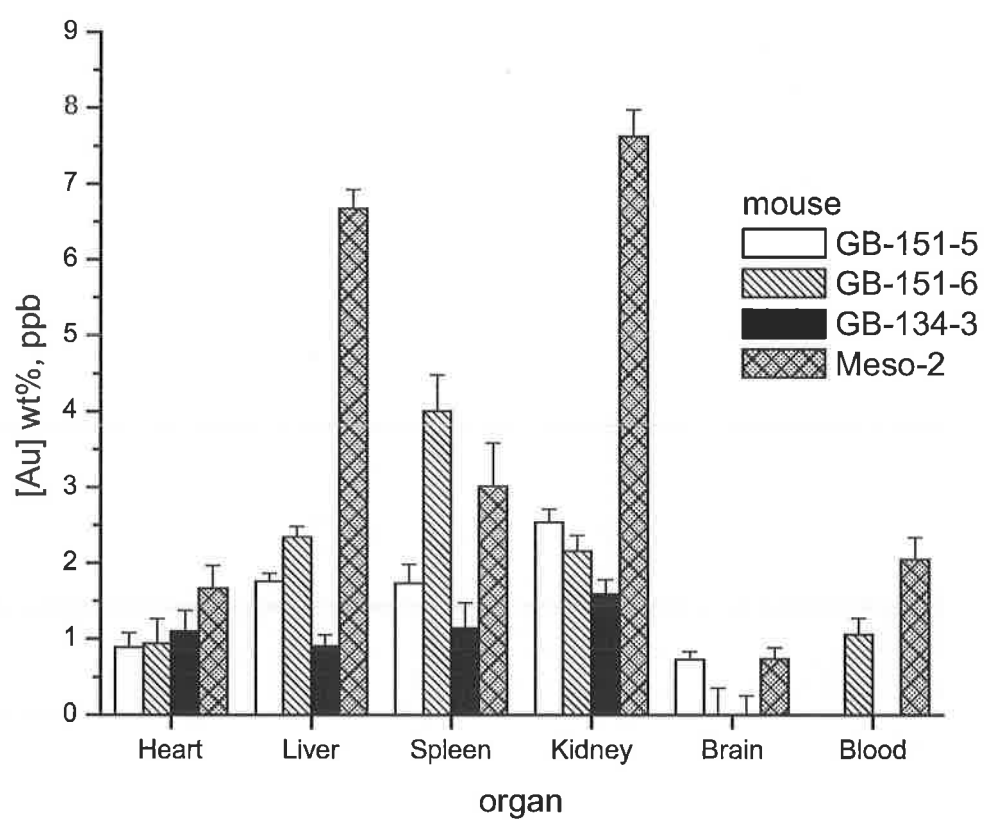


Figure 111

**Figure 112**