The present invention also provides any one of the embodiments disclosed below and indicated with the numbers 1 to 61.

1. A diagnostic method, wherein said method aids in the detection of a disease or other medical condition in a subject, the method comprising the steps of:
   (a) isolating a microvesicle fraction from a biological sample from the subject;
   (b) detecting the presence or absence of a biomarker within the microvesicle fraction, wherein the biomarker is associated with the disease or other medical condition.

2. A monitoring method, wherein said method aids in monitoring the status of a disease or other medical condition in a subject, the method comprising the steps of:
   (a) isolating a microvesicle fraction from a biological sample from the subject;
   (b) detecting the presence or absence of a biomarker within the microvesicle fraction, wherein the biomarker is associated with the disease or other medical condition.

3. An evaluation method, wherein said method aids in evaluating treatment efficacy in a subject having a disease or other medical condition, the method comprising the steps of:
   (a) isolating a microvesicle fraction from a biological sample from the subject;
   (b) detecting the presence or absence of a biomarker within the microvesicle fraction, wherein the biomarker is associated with treatment efficacy for the disease or other medical condition.

4. The method of any of claims 1-3, wherein the biological sample is a sample of bodily fluid.

5. The method of any of claims 1-4, wherein the biomarker is:
   (i) a species of nucleic acid;
   (ii) the level of expression of a nucleic acid;
   (iii) a nucleic acid variant; or
   (iv) a combination thereof.

6. The method of any of claims 1-5, wherein the biomarker is messenger RNA, microRNA, siRNA or shRNA.

7. The method of any of claims 1-5, wherein the biomarker is DNA, single stranded DNA, complementary DNA, or noncoding DNA.

8. The method of any of claims 1-7, wherein the disease or other medical condition is a neoplastic disease or condition.

9. The method of claim 8, wherein the biomarker is a nucleic acid listed in any of Tables 3-15, or a variant thereof.

10. The method of claim 9, wherein the disease or other medical condition is glioblastoma.

11. The method of claim 10, wherein the biomarker is a nucleic acid listed in any of Tables 8-12, or a variant thereof.

12. The method of claim any of claims 8-11, wherein the biomarker is microRNA-21.

13. The method of claim 8, wherein the biomarker is associated with a clinically distinct type or subtype of tumor.

14. The method of any of claims 1-13, wherein the biomarker is a variant in the EGFR gene.

15. The method of claim 14, wherein the biomarker is the EGFRvIII mutation.

16. The method of claim 8, wherein the biomarker is associated with prostate cancer.

17. The method of claim 16, wherein the biomarker is TMPRSS2-ERG, PCA-3, PSA, or variants thereof.

18. The method of claim 8, wherein the biomarker is associated with melanoma.

19. The method of claim 18, wherein the biomarker is a BRAF variant.

20. The method of any of claims 1-3, wherein the biomarker is the expression level of one or more nucleic acids selected from the group consisting of let-7a; miR-15b; miR-16; miR-19b; miR-21; miR-26a; miR-27a; miR-92; miR-93; miR-320 and miR-20.

21. The method of any of claims 1-7, wherein the disease or other medical condition is a metabolic disease or condition.

22. The method of claim 21, wherein the metabolic disease or condition is diabetes, inflammation, or a perinatal condition.

23. The method of claim 21, wherein the metabolic disease or condition is associated with iron metabolism.

24. The method of claim 21, wherein the biomarker is a nucleic acid encoding hepcidin, or a fragment or variant thereof.

25. The method of any of claims 1-7, wherein the medical condition is a post transplantation condition.

26. The method of any of claims 1-7, wherein the biomarker is mRNA encoding a member of the family of matrix metalloproteinases.

27. The method of any of claims 1-7, wherein the biomarker is a nucleic acid listed in Table 10.

28. The method of any of claims 1-7, wherein the disease or other medical condition is cancer and the biomarker is a nucleic acid variant of the Kras gene.

29. The method of any of claims 1-28, wherein the microvesicles in the microvesicle fraction have a diameter in the range of about 30 nm to about 800 nm.

30. The method of claim 29, wherein the range is about 30 nm to about 200 nm.

31. The method of any of claims 1-30, wherein step (a) is performed by size exclusion chromatography, density gradient centrifugation, differential centrifugation, nanomembrane ultrafiltration, immunoabsorbent capture, affinity purification, microfluidic separation, or combinations thereof.

32. The method of any of claims 1-31, wherein the biomarker is a nucleic acid and the method further comprises amplification of the nucleic acid.

33. The method of any of claims 1-32, wherein the detecting step b) is performed by microarray analysis, PCR, hybridization with allele-specific probes, enzymatic mutation detection, ligation chain reaction (LCR), oligonucleotide ligation assay (OLA), flow-cytometric heteroduplex analysis, chemical cleavage of mismatches, mass spectrometry, nucleic acid sequencing, single strand conformation polymorphism (SSCP), denaturing gradient gel electrophoresis (DGGE), temperature gradient gel electrophoresis (TGGE),

restriction fragment polymorphisms, serial analysis of gene expression (SAGE), or combinations thereof.

34. The method of any of claims 1-33, further comprising the isolation of a selective microvesicle fraction derived from cells of a specific type.

35. The method of claim 34, wherein the cells are tumor cells.

36. The method of claim 34, wherein the microvesicle fraction is derived from lung, pancreas, stomach, intestine, bladder, kidney, ovary, testis, skin, colorectal, breast, prostate, brain, esophagus, liver, placenta, fetus cells, or combinations thereof.

37. The method of claim 34, wherein the selective microvesicle fraction consists essentially of urinary microvesicles.

38. A diagnostic method, wherein said method aids in the detection of a disease or other medical condition in a subject, the method comprising the steps of:

    (a) obtaining a biological sample from the subject; and
    (b) determining the concentration of microvesicles within the biological sample.

39. A monitoring method, wherein said method aids in monitoring the status of a disease or other medical condition in a subject, the method comprising the steps of:

    (a) obtaining a biological sample from the subject; and
    (b) determining the concentration of microvesicles within the biological sample.

40. The method of claim 38 or 39, further comprising the step of isolating a microvesicle fraction from the biological sample prior to determining the concentration.

41. The method of claim 40, wherein the isolation step is performed by size exclusion chromatography, density gradient centrifugation, differential centrifugation, nanomembrane ultrafiltration, immunoabsorbent capture, affinity purification, microfluidic separation, or combinations thereof.

42. The method of claim 40 or 41, wherein the microvesicle fraction is derived from cells of a specific type.

43. The method of claim 42, wherein the cells are tumor cells.

44. The method of claim 42, wherein the microvesicle fraction is derived from lung, pancreas, stomach, intestine, bladder, kidney, ovary, testis, skin, colorectal, breast, prostate, brain, esophagus, liver, placenta, fetus cells, or combinations thereof.

45. The method of claim 42, wherein the selective microvesicle fraction consists essentially of urinary microvesicles.

46. The method of any of claims 38-45, wherein the microvesicles have a diameter in the range of about 30 nm to about 800 nm.

47. The method of claim 46, wherein the range is about 30 nm to about 200 nm.

48. A method for delivering a nucleic acid or protein to a target cell in an individual comprising, administering one or more microvesicles that contain the nucleic acid or protein, or one or more cells that produce such microvesicles, to the individual such that the microvesicles enter the target cell of the individual.

49. The method of claim 48, wherein microvesicles are delivered to a brain cell.

50. The method of claim 48 or 49, wherein the nucleic acid delivered is siRNA, shRNA, mRNA, microRNA, DNA, or combinations thereof.

51. A method for performing a body fluid transfusion, comprising the steps of obtaining a fraction of donor body fluid free of all or substantially all microvesicles, or free of all or substantially all microvesicles from a particular cell type, and introducing the microvesicle-free fraction to a patient.

52. The method of claim 51, wherein the cell type is a tumor cell type.

53. The method of 51 or 52, wherein the body fluid is blood, serum or plasma.

54. A composition of matter comprising a sample of body fluid free of all or substantially all microvesicles, or free of all or substantially all microvesicles from a particular cell type.

55. The composition of claim 54, wherein the body fluid is blood, serum or plasma.

56. A method for performing body fluid transfusion, comprising the steps of obtaining a microvesicle-enriched fraction of donor body fluid and introducing the microvesicle-enriched fraction to a patient.

57. The method of claim 56, wherein the fraction is enriched with microvesicles derived from a particular cell type.

58. The method of claim 56 or 57, wherein the body fluid is blood, serum or plasma

59. A composition of matter comprising a sample of body fluid enriched with microvesicles.

60. The composition of claim 59, wherein the microvesicles are derived from a particular cell type.

61. The composition of claim 59 or 60, wherein the bodily fluid is blood, serum or plasma.