IN THE CIRCUIT COURT OF THE CITY OF ST. LOUIS STATE OF MISSOURI

TIMOTHY KANE: DOROTHY A. BAKER: LARISSA BALLARD; BARNEY W. BERRYMAN; ROBERT L. BINGHAM; TROY L. BREWER; BOBBY E. BRILEY II; TAMMY BRODERICK: JOE RAYMOND BROWN: RODNEY CHARLTON; EDWIN CHARLIE CRABTREE JR.; ANTOINE CURRY; THOMAS M. DELA CRUZ; ANGELA DYER; BILL ELLIS JR.; JON MICHAEL FARISH; JANET FERRANTE; DANNY GILLAM; JAMES GODWIN; JEAN GIUNCA; STANLEY HARPER; ROSITA HAYNES; MARK M. HEAD; ROBERT W. HELMS; QUENTON F. HENRY; ELIZABETH HOUSER; JAMES D. ISENBERG; WAYNE JAMES; ROBERT A. JENKINS; ; LESLIE L. LALOUETTE; MARIAN LANGE; DOMINIQUE J. LASTER; JODY L. LINDLEY; JIMMY LEE LINDSAY; CARLOS LUNA; LLOYD MARTIN; KENNETH T. MAYNARD; ROBERT MAYO; SALLY GAIL MIRACLE; DUSTIN MOFFETT; ROBERT A. MOORE; BETTY D. MORGAN; HARRY MOSSBARGER; MARIA PICHARDO; ROBERT PRIEST; PAULITA LOZANO, JAIME RAMIREZ, JR., and SELENA RAMIREZ, individually and for decedent JAIME RAMIREZ GARZA; RON T. RAMIREZ; ROSALIA REYES SEPULVEDA; GLORIA ROYSTER; JERROD SANDERS; KIMBERLY SEWELL; EDWARD SHACKLEFORD; KURT SIMMONS; DEAN A. SINIBALDI, JR.; WILLIAM SMITH; STACY TOEPFER; BRIAN UHLICH; JOSEPH VELASOUEZ: KENNETH E. WALLS: LATWON WHITBY; GUY WICKER, and RUBEN YANES.

Plaintiffs,

v.

MONSANTO COMPANY

PETTI	TON AND
JURY	DEMAND

Division:

Case No.:		
•		

Serve:		
	Defendant.	

PETITION

COME NOW Plaintiffs, by and through their undersigned counsel, and for their causes of action against Defendant Monsanto Company, alleging the following upon information and belief (including investigation made by and through Plaintiffs' counsel), except those allegations that pertain to Plaintiffs, which are based on personal knowledge:

INTRODUCTION

Plaintiffs bring this cause of action against Defendant pursuant to Rule 52.05(a) of the Missouri Rules of Civil Procedure, as their claims arise out of the same series of transactions and occurrences, and their claims involve common questions of law and/or fact. All claims in this action are a direct and proximate result of Defendants' negligent, willful, and wrongful conduct in connection with the design, development, manufacture, testing, packaging, promoting, marketing, distribution, and/or sale of the products as Roundup[®]. All Plaintiffs in this action seek recovery for damages as a result of developing Non-Hodgkin's Lymphoma ("NHL"), which was directly and proximately caused by such wrongful conduct by Defendant, the unreasonably dangerous and defective nature of Roundup[®], and its active ingredient, glyphosate, and the attendant effects of developing NHL. No Plaintiff knew of an association between exposure to Roundup[®] and the increased risk of developing NHL until well after July 29, 2015, when the International Agency for Research on Cancer ("IARC"), an agency of the World Health

Organization ("WHO"), first published its evaluation of glyphosate. All of the claims involve common questions of law and fact and share legal and medical issues that arise out of all of the Plaintiffs' exposures to Roundup[®].

THE PARTIES

PLAINTIFFS

Timothy Kane

- 1. Plaintiff Timothy Kane is a citizen of the City of St. Louis, State of Missouri.
- 2. At all relevant times, including from approximately 1993 to and including 2007, Plaintiff Kane was exposed to Roundup[®] in the City of St. Louis, State of Missouri, where he piped Roundup[®] and/or ingredients of Roundup[®], including its active ingredient glyphosate, from a barge to holding tanks, trucks and/or other containers at 2425 S. Wharf Street in the City of St. Louis.
- 3. In or about March 2014, Plaintiff Kane was diagnosed with NHL, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 4. As a direct and proximate result of these injuries, Plaintiff Kane has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Kane has otherwise been damaged in a personal and pecuniary nature.
- 5. During the entire time that Plaintiff Kane was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

6. At all relevant times, Plaintiff Kane was exposed to Roundup[®] in the State of Missouri. Plaintiff Kane was first injured as that term is defined in 508.010 Mo. Rev. Stat. in the 22nd Judicial Circuit, City of St. Louis.

Dorothy A. Baker

- 7. Plaintiff Dorothy A. Baker is a citizen of the State of Washington and was born on August 9, 1953. Plaintiff Baker resides in the City of Mossyrock, County of Lewis.
- 8. Plaintiff Baker was exposed to Roundup[®] in Lewis County, Washington from 1987 to 2003, at home to control weeds along her driveway, yard, garden and parking area. She purchased Roundup[®] for use at home from local hardware stores.
- 9. Plaintiff Baker was further exposed to Roundup[®] in Lewis, Washington, from 2008 to 2016, at home to control weeds along her driveway, yard, garden, property lines and wooded areas. She purchased Roundup[®] for use at home from Home Depot and Wilco Farm Store in Chehalis, Washington.
- 10. In or about December 2015, Plaintiff Baker was diagnosed with NHL in Puyallup, Washington, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 11. As a direct and proximate result of these injuries, Plaintiff Baker has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Baker has otherwise been damaged in a personal and pecuniary nature.

12. During the entire time that Plaintiff Baker was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Larissa Ballard

- 13. Plaintiff Larissa Ballard is a citizen of the State of Arizona and was born on March 18, 1982. She resides in the City of Tucson, County of Pima.
- 14. Plaintiff Ballard was exposed to Roundup[®] in Tucson, Arizona, from 1992 through 2005, and from 2011 through 2016, while applying Roundup[®] at home to control weed overgrowth.
- 15. Plaintiff Ballard was further exposed at Fort Bragg, North Carolina, from 2005-2011, while applying Roundup[®] at home to control weed overgrowth.
- 16. In or about April 2013, Plaintiff Ballard was diagnosed with mediastinal B-cell lymphoma (a type of NHL) in Tucson, Arizona, at Carondelet St. Joseph's Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 17. As a direct and proximate result of these injuries, Plaintiff Ballard has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Ballard has otherwise been damaged in a personal and pecuniary nature.
- 18. During the entire time that Plaintiff Ballard was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Barney W. Berryman

- 19. Plaintiff Barney W. Berryman is a citizen of the State of Alabama and was born on February 7, 1952. Plaintiff resides in the City of Town Creek, County of Lawrence.
- 20. Plaintiff Berryman was exposed to Roundup[®] in Lauderdale County, Alabama, from 1975 to 1996, at home to control weeds along his driveway, fence line, and garden. He purchased Roundup[®] for use at home from his local co-op or garden store (e.g., Home Depot, Lowe's).
- 21. Plaintiff Berryman was further exposed to Roundup[®] in Lawrence County,

 Alabama, from 1996 to 2016, at home to control weed growth. He purchased Roundup[®] for use
 at home from the Lawrence County Exchange, Home Depot, and Lowe's.
- 22. Plaintiff Berryman was further exposed to Roundup[®] in Courtland, Alabama, from 1975 to 2014, while working at the Champion-International Paper Mill. He was exposed when crews sprayed Roundup[®] on and around the 2,000-acre tree farm to control weed growth.
- 23. In or about April 2016, Plaintiff Berryman was diagnosed with Large B-Cell NHL in Huntsville, Alabama, at Pathology Associates, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 24. As a direct and proximate result of these injuries, Plaintiff Berryman has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Berryman has otherwise been damaged in a personal and pecuniary nature.

25. During the entire time that Plaintiff Berryman was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Robert L. Bingham

- 26. Plaintiff Robert L. Bingham is a citizen of the State of Arizona and was born on November 6, 1943. Plaintiff Bingham resides in the City of Tucson, County of Pima.
- 27. Plaintiff Bingham was exposed to Roundup[®] in Maricopa County from 1981 to 1986, while working for the Maricopa County Flood Control System. He was exposed when he and his crew sprayed Roundup[®] on and around the waterway to control weed growth.
- 28. In or about June 2006, Plaintiff Bingham was diagnosed with Mantle Cell Lymphoma, a type of NHL, in Glendale, Arizona, at Palo Verde Oncology, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 29. As a direct and proximate result of these injuries, Plaintiff Bingham has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Bingham has otherwise been damaged in a personal and pecuniary nature.
- 30. During the entire time that Plaintiff Bingham was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Troy L. Brewer

31. Plaintiff Troy L. Brewer is a citizen of the State of Arkansas and was born on May 17, 1953. Plaintiff resides in the City of England, County of Lonoke.

- 32. Plaintiff Brewer was exposed to Roundup[®] in Jefferson County, Arkansas, from 2005 to 2010, at home to control weeds along the house exterior and throughout the yard. He purchased Roundup[®] for use at home from his local feed or garden store.
- 33. Plaintiff Brewer was further exposed to Roundup[®] in Jefferson County, Arkansas, from 2005 to 2010, while working as a commercial sprayer. He was exposed while mixing, loading and applying Roundup[®] to thousands of acres of soybean fields to control weed growth.
- 34. In or about March 2012, Plaintiff Brewer was diagnosed with Chronic Lymphocytic Leukemia ("CLL"), a form of NHL, in Little Rock, Arkansas, at University of Arkansas for Medical Sciences, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 35. As a direct and proximate result of these injuries, Plaintiff Brewer has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Brewer has otherwise been damaged in a personal and pecuniary nature.
- 36. During the entire time that Plaintiff Brewer was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Bobby E. Briley II

- 37. Plaintiff Bobby E. Briley II is a citizen of the State of Arkansas and was born on February 14, 1972. Plaintiff resides in the City of McCrory, County of Woodruff.
- 38. Plaintiff Briley was exposed to Roundup[®] in Woodruff County, Arkansas, from 1996 to 2010, at home to control weeds along his driveway, fence line, house, and storage

buildings. He purchased Roundup[®] for use at home from local stores including his local co-op store, Crop Production Service.

- 39. Plaintiff Briley was further exposed to Roundup[®] as a custom applicator in Monroe, Lee, Prairie and St. Francis Counties, Arkansas, from 1996 to 2003, while employed at Lawhon Farm Services. He was exposed while applying Roundup[®] to various crops, including soybeans and corn, to control weed growth.
- 40. Plaintiff Briley was further exposed to Roundup[®] as a custom applicator in Monroe, Lee, Prairie and St. Francis Counties, Arkansas, from 2003 to 2010, while self-employed at Briley's Custom Spraying. He was exposed while applying Roundup[®] to various crops, including soybeans and corn, to control weed growth.
- 41. In or about June 2010, Plaintiff Briley was diagnosed with follicular lymphoma (a subtype of NHL) in Little Rock, Arkansas, at Hematology Oncology Services of Arkansas, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 42. As a direct and proximate result of these injuries, Plaintiff Briley has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Briley has otherwise been damaged in a personal and pecuniary nature.
- 43. During the entire time that Plaintiff Briley was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Tammy Broderick

- 44. Plaintiff Tammy Broderick is a citizen of the State of California and was born on December 13, 1969. Plaintiff Broderick resides in the City of Lake Elsinore, County of Riverside.
- 45. Plaintiff Broderick was exposed to Roundup[®] in California from the mid-1970s to 1986, and in 2007, while applying Roundup[®] in and around her grandparents' home. She sprayed Roundup[®] from June to August with a spray bottle and hand-pump to control weed overgrowth.
- 46. Plaintiff Broderick was further exposed to Roundup[®] from 1986 to 1992, 1996 to 2007, and 2008 to 2011, at her home in Tacoma, Washington, while controlling weed overgrowth.
- 47. Plaintiff Broderick was further exposed to Roundup[®] from 1992 to 1996, at her home in Antwerp, Ohio, while controlling weed overgrowth
- 48. Plaintiff Broderick was further exposed to Roundup[®] from 2011 to 2016, at her home in Riverside, California, while controlling weed overgrowth.
- 49. In or about September 2010, Plaintiff Broderick was diagnosed with follicular lymphoma (a type of NHL) in Tacoma, Washington, at Tacoma General Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 50. As a direct and proximate result of these injuries, Plaintiff Broderick has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering

and loss of enjoyment of life, and Plaintiff Broderick has otherwise been damaged in a personal and pecuniary nature.

51. During the entire time that Plaintiff Broderick was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Joe Raymond Brown

- 52. Plaintiff Joe R. Brown is a citizen of the State of Mississippi and was born on September 3, 1948. Plaintiff resides in the City of Myrtle, County of Union.
- 53. Plaintiff Brown was exposed to Roundup[®] in Union County, Mississippi, from 1997 to 2011, at home to control weeds and was exposed while mixing and applying Roundup[®] along his along the house exterior and across his property. He purchased Roundup[®] for use at home from his local co-op or garden store (e.g., Home Depot, Lowe's).
- 54. In or about March 2015, Plaintiff Brown was diagnosed with Large B-Cell NHL in New Albany, Mississippi, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 55. As a direct and proximate result of these injuries, Plaintiff Brown has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Brown has otherwise been damaged in a personal and pecuniary nature.
- 56. During the entire time that Plaintiff Brown was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Rodney Charlton

- 57. Plaintiff Rodney Charlton is a citizen of the State of Kansas and was born on March 18, 1958. Plaintiff resides in the City of Cedar Point, County of Chase.
- 58. Plaintiff Charlton was further exposed to Roundup[®] in Coffey County, Kansas, from 2000 to 2015, at his residential property. He used Roundup[®] to control weed growth and treat poison ivy. He purchased Roundup[®] for use at home from either the Walmart in Newton, Kansas or the Walmart in Derby, Kansas.
- 59. On or about October 24, 2008, Plaintiff Charlton was diagnosed with Diffuse Large B-Cell NHL in Wichita, Kansas, at Via Christi St. Francis Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 60. As a direct and proximate result of these injuries, Plaintiff Charlton has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Charlton has otherwise been damaged in a personal and pecuniary nature.
- 61. During the entire time that Plaintiff Charlton was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Edwin Charlie Crabtree Jr.

62. Plaintiff Edwin Charlie Crabtree Jr. is a citizen of the State of Arkansas and was born on March 10, 1960. Plaintiff resides in the City of Emerson, County of Columbia.

- 63. Plaintiff Crabtree was exposed to Roundup[®] in Caddo Parish, Louisiana, from 1995 to 1999, at home to control weeds. He purchased Roundup[®] for use at home from his local garden store, generally Home Depot.
- 64. Plaintiff Crabtree was further exposed to Roundup[®] in Columbia County,

 Arkansas, from 1999 to 2000, at home to control weed growth. He purchased Roundup[®] for use at home from his local garden store, generally Home Depot.
- 65. Plaintiff Crabtree was further exposed to Roundup[®] in Union County, Arkansas, from 2000 to 2003 at home to control weed growth. He purchased Roundup[®] for use at home from his local Walmart.
- 66. Plaintiff Crabtree was further exposed to Roundup[®] in Bossier Parish, Louisiana, from 2003 to 2008, at home to control weed growth. He purchased Roundup[®] for use at home from his local Walmart.
- 67. Plaintiff Crabtree was further exposed to Roundup[®] in Columbia County,

 Arkansas, from 2008 through 2015, at home to control weed growth. He purchased Roundup[®]

 for use at home from his local Atwood's and Walmart.
- 68. Plaintiff Crabtree was further exposed to Roundup[®] in Caddo Parish, Louisiana, from 1995 to 1999, while working as a ground commercial applicator. He was exposed when mixing, loading and applying Roundup[®] to control weeds in various areas including ditches and along roadsides, road signs, fences, high lines, and railroad tracks.
- 69. In or about January 2016, Plaintiff Crabtree was diagnosed with Follicular NHL in Hot Springs, Arkansas, at CHI St. Vincent Oncology Clinic, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of

Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 70. As a direct and proximate result of these injuries, Plaintiff Crabtree has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Crabtree has otherwise been damaged in a personal and pecuniary nature.
- 71. During the entire time that Plaintiff Crabtree was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Antoine Curry

- 72. Plaintiff Antoine Curry is a citizen of the State of New Jersey and was born on May 20, 1947. Plaintiff Curry resides in the City of Berkeley Heights, County of Union.
- 73. Plaintiff Curry was exposed to Roundup[®] in Yonkers, New York, from 2000 to 2013, while applying Roundup[®] at home to control weed growth. He purchased Roundup[®] for home use from Home Depot and Costco.
- 74. In or about October 2013, Plaintiff Curry was diagnosed with chronic lymphocytic leukemia/small lymphocytic lymphoma (a type of NHL) in Bronx, New York, at Montefiore Medical Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 75. As a direct and proximate result of these injuries, Plaintiff Curry has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and

loss of enjoyment of life, and Plaintiff Curry has otherwise been damaged in a personal and pecuniary nature.

76. During the entire time that Plaintiff Curry was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Thomas M. Dela Cruz

- 77. Plaintiff Thomas M. Dela Cruz is a citizen of the State of Hawaii and was born on December 6, 1961. He resides in the City of Pepeekeo, County of Hawaii
- 78. Plaintiff Dela Cruz was exposed to Roundup[®] in Pahala, Hawaii, from 1980 through 1993, while working at Kau Agribusiness Co., Inc. He sprayed Roundup[®] in sugarcane fields with a knapsack sprayer to control weed overgrowth for 8 hours a day, 5 to 6 days a week, year-round.
- 79. In or about February 2014, Plaintiff Dela Cruz was diagnosed with high-grade mature B-cell lymphoma (a form of NHL) in Hilo, Hawaii, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 80. As a direct and proximate result of these injuries, Plaintiff Dela Cruz has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Dela Cruz has otherwise been damaged in a personal and pecuniary nature.
- 81. During the entire time that Plaintiff Dela Cruz was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Angela Dyer

- 82. Plaintiff Dyer is a citizen of the State of Texas and was born on July 10, 1959. She resides in the City of Purdon, County of Navarro.
- 83. Plaintiff Dyer was exposed to Roundup[®] in Pursley, Texas from 1993 through 2015, while applying Roundup[®] on and around her 43-acre and 64.7-acre hay farms to control weed overgrowth, poison ivy, and mesquite trees. She applied Roundup[®] with a hand-pump and tractor. She purchased Roundup[®] from Walmart and her local feed store.
- 84. In or about November 2015, Plaintiff Dyer was diagnosed with Large B-cell Lymphoma (an aggressive form of NHL) in Waxahachie, Texas, at Baylor Scott & White, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 85. As a direct and proximate result of these injuries, Plaintiff Dyer has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Dyer has otherwise been damaged in a personal and pecuniary nature.
- 86. During the entire time that Plaintiff Dyer was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Bill Ellis Jr.

87. Plaintiff Bill Ellis Jr. is a citizen of the State of Mississippi and was born on July 1, 1950. Plaintiff resides in the City of Winterville, County of Washington.

- 88. Plaintiff Ellis was exposed to Roundup[®] in Washington County, Mississippi, from 1985 to 2002, at home to control weeds along the house exterior and fence lines. He used Roundup[®] for use at home provided by his employer.
- 89. Plaintiff Ellis was further exposed to Roundup[®] in Washington County,
 Mississippi, from 1985 to 2002, while working for Capstone Partners. He was exposed while
 mixing, loading and applying Roundup[®] to soybeans and cotton fields to control weed growth.
- 90. In or about February 2010, Plaintiff Ellis was diagnosed with Chronic Lymphocytic Leukemia (a form of NHL) in Greenville, Mississippi, at Greenville Clinic, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 91. As a direct and proximate result of these injuries, Plaintiff Ellis has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Ellis has otherwise been damaged in a personal and pecuniary nature.
- 92. During the entire time that Plaintiff Ellis was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Jon Michael Farish

93. Plaintiff Jon Michael Farish is a citizen of the State of Mississippi and was born on November 4, 1971. Plaintiff resides in the City of Indianola, County of Sunflower.

- 94. Plaintiff Farish was exposed to Roundup[®] in Sunflower County, Mississippi, from 1998 to 2016, at home to control weeds around his home and property. He obtained Roundup[®] for use at home from his employers.
- 95. Plaintiff Farish was further exposed to Roundup[®] in Sunflower County, Mississippi, from 1988 to 1990, while working on a local Mississippi Delta farm. He was exposed to Roundup[®] when applying it along fence lines to control weed growth.
- 96. Plaintiff Farish was further exposed to Roundup[®] in Sunflower County,
 Mississippi, from 1988 to 2016, while working at Wade, Inc. He was exposed to Roundup[®]
 while repairing and/or servicing agricultural equipment.
- 97. In or about June 2014, Plaintiff Farish was diagnosed with B-Cell NHL in Oxford, Mississippi, at Baptist Medical Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 98. As a direct and proximate result of these injuries, Plaintiff Farish has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Farish has otherwise been damaged in a personal and pecuniary nature.
- 99. During the entire time that Plaintiff Farish was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Janet Ferrante

100. Plaintiff Janet Ferrante is a citizen of the State of Michigan and was born on September 9, 1952. Plaintiff resides in the City of Almont, County of Lapeer.

- 101. Plaintiff Ferrante was further exposed to Roundup[®] in Lapeer County, Kansas, from 2002 to 2015, at her residential property. She sprayed Roundup[®] several times annually on her residential property to control weed growth. She purchased Roundup[®] for use at home from the Home Depot in Washington Township, Michigan.
- 102. On or about July 3, 2007, Plaintiff Ferrante was diagnosed with High-Grade Diffuse Large B-Cell NHL in Ann Arbor, Michigan at University of Michigan Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 103. As a direct and proximate result of these injuries, Plaintiff Ferrante has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Ferrante has otherwise been damaged in a personal and pecuniary nature.
- 104. During the entire time that Plaintiff Ferrante was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

James Godwin

- 105. Plaintiff James Godwin is a citizen of the State of Florida and was born on May23, 1963. He resides in the City of Pensacola, County of Escambia.
- 106. Plaintiff James Godwin was exposed to Roundup[®] in Pensacola, Florida from 2004 to 2012, while working for the City of Pensacola and Wallace Sprinkler and Landscaping as a maintenance worker, which included transporting, and spraying Roundup[®].

- 107. In or about December 2015, Plaintiff James Godwin was diagnosed with T-cell lymphoma (a type of NHL), and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 108. As a direct and proximate result of these injuries, Plaintiff James Godwin has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.
- 109. During the entire time that Plaintiff James Godwin was exposed to Roundup[®], he did not know that the exposure to Roundup[®] was injurious to his health or the health of others.

Danny Gillam

- 110. Plaintiff Danny Gillam is a citizen of the State of Iowa and was born on July 28,1956. Plaintiff resides in the City of Bettendorf, County of Scott.
- 111. Plaintiff Gillam was exposed to Roundup[®] in Scott County, Iowa, from approximately 1980 to 2015, at home to control weeds. He purchased Roundup[®] for use at home from his local store (e.g., Home Depot, Lowe's).
- 112. In or about August 1, 2012, Plaintiff Gillam was diagnosed with B-Cell NHL in Davenport, Iowa, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Gillam has otherwise been damaged in a personal and pecuniary nature.
- 114. During the entire time that Plaintiff Gillam was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Jean Giunca

- 115. Plaintiff Jean Giunca is a citizen of the State of Texas and was born on September7, 1962. Plaintiff Giunca resides in the City of Flower Mound, Texas.
- 116. Plaintiff Giunca was exposed to Roundup[®] in Flower Mound, Texas from 1997 to 2015, at home to control weeds on several large vacant residential lots and small acreage he owned and maintained. He purchased Roundup[®] for use at home from local farm supply store.
- 117. In or about May 2015, Plaintiff Baker was diagnosed with NHL, in Flower Mound, Texas at Texas Oncology, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Giunca has otherwise been damaged in a personal and pecuniary nature.
- 119. During the entire time that Plaintiff Giunca was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Stanley Harper

- 120. Plaintiff Stanley Harper is a citizen of the State of North Carolina and was born on January 3, 1944. He resides in the City of Bolivia, County of Brunswick.
- 121. Plaintiff Stanley Harper was exposed to Roundup[®] in Wilmington, NC, from 1973 to 2006, while he applied Roundup[®] around his home to control weeds and grass overgrowth. He purchased Roundup[®] from the Agri Supply Store in Wilmington, NC.
- 122. Plaintiff Stanley Harper was also exposed to Roundup[®] in Whiteville, NC, from 2006 to 2016, while he applied Roundup[®] on his farm to control weed and grass overgrowth.

 He purchased Roundup[®] from Tractor Supply located in Whiteville, NC.
- 123. In or about January 2013, Plaintiff Stanley Harper was diagnosed with Non-Hodkins Lymphoma in Wilmington, North Carolina by Dr. Kenneth Kotz, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 124. As a direct and proximate result of these injuries, Plaintiff Stanley Harper has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.
- 125. During the entire time that Plaintiff Stanley Harper was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Rosita Haynes

- 126. Plaintiff Rosita Haynes is a citizen of the State of Arkansas and was born on March 21, 1955. She resides in the City of Winchester, County of Drew.
- 127. Plaintiff Haynes was exposed to Roundup[®] in Winchester, Arkansas, from 1994 until 2012, while applying Roundup[®] at home to control weeds and while applying it on her neighbor's residential property to control overgrowth. She purchased Roundup[®] from local stores, including Lowe's.
- 128. In or about May 2015, Plaintiff Haynes was diagnosed with NHL in Little Rock, Arkansas, at the University of Arkansas for Medical Sciences, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 129. As a direct and proximate result of these injuries, Plaintiff Haynes has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Haynes has otherwise been damaged in a personal and pecuniary nature.
- 130. During the entire time that Plaintiff Haynes was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Mark M. Head

131. Plaintiff Mark M. Head is a citizen of the State of North Carolina and was born on January 31, 1977. Plaintiff Head resides in the City of Roanoke, County of Dare.

- 132. Plaintiff Head was exposed to Roundup[®] in Dare County, North Carolina, from 1998 to 2008, at home to control weeds along his fence line. He purchased Roundup[®] for use at home from his local co-op or garden store (e.g., Home Depot, Lowe's).
- 133. In or about September 2008, Plaintiff Head was diagnosed with Large B-Cell NHL in Birmingham, Alabama, at UAB Medicine, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 134. As a direct and proximate result of these injuries, Plaintiff Head has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Head has otherwise been damaged in a personal and pecuniary nature.
- 135. During the entire time that Plaintiff Head was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Robert W. Helms

- 136. Plaintiff Robert W. Helms is a citizen of the State of Alabama and was born on September 30, 1954. Plaintiff resides in the City of Enterprise, Alabama, County of Coffee.
- 137. Plaintiff Helms was exposed to Roundup[®] in Coffee County, Alabama, from 1995 through 2016, while transporting, mixing, loading and applying thousands of gallons of Roundup[®] to his row crops, including cotton and peanuts, and to areas around his farm and home to control weed growth. He purchased Roundup[®] for both commercial use and at his home from his local co-op and other local chemical supply companies.

- 138. In or about December 2015, Plaintiff Helms was diagnosed with NHL and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 139. As a direct and proximate result of these injuries, Plaintiff Helms has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Helms has otherwise been damaged in a personal and pecuniary nature.
- 140. During the entire time that Plaintiff Helms was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Quenton F. Henry

- 141. Plaintiff Quenton F. Henry is a citizen of the State of Tennessee and was born on July 17, 1949. Plaintiff resides in the City of Wartburg, County of Morgan.
- 142. Plaintiff Henry was exposed to Roundup[®] in Morgan County, Tennessee, from 1975 to 2015, at home to control weeds along landscaping, in garden and throughout yard. He purchased Roundup[®] for use at home from his local co-op or garden store (e.g., Home Depot, Lowe's).
- 143. Plaintiff Henry was exposed to Roundup[®] in Morgan County, Tennessee, from 1990 to 2015, at his tree farm to control weeds. He purchased Roundup[®] for use at his farm from his local co-op or garden store (e.g., Home Depot, Lowe's).
- 144. Plaintiff Henry was further exposed to Roundup[®] in Morgan, Scott and Anderson Counties, Tennessee, from 1990 to 2015, while working as a Tennessee Wildlife Officer. He

was exposed particularly when working on Bowater Tree Farm to which Roundup[®] was applied to control weed growth.

- 145. In or about November 2015, Plaintiff Henry was diagnosed with Large B-Cell NHL in Oak Ridge, Tennessee, at East Tennessee Ear, Nose and Throat, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 146. As a direct and proximate result of these injuries, Plaintiff Henry has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Henry has otherwise been damaged in a personal and pecuniary nature.
- 147. During the entire time that Plaintiff Henry was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Elizabeth Houser

- 148. Plaintiff Elizabeth Houser is a citizen of the State of North Carolina and was born on July 26, 1941. Plaintiff Houser resides in the City of Lincolnton, County of Lincoln.
- 149. Plaintiff Houser was exposed to Roundup[®] in Lincoln County, North Carolina, from 1976 to present while spraying Roundup[®] around her barn and silo to control Johnson grass. She also applied Roundup[®] around her home to control weed overgrowth around her pond, pool, flower beds, garden and fence line. She purchased Roundup[®] from Wal-Mart, AC Hardware, and other locations.

- 150. In or about May 2013, Plaintiff Houser was diagnosed with B-cell small lymphocytic lymphoma/chronic lymphocytic leukemia (a type of NHL) in Lincolnton, North Carolina, at Carolinas Medical Center Lincoln, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 151. As a direct and proximate result of these injuries, Plaintiff Houser has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Houser has otherwise been damaged in a personal and pecuniary nature.
- 152. During the entire time that Plaintiff Houser was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

James D. Isenberg

- 153. Plaintiff James D. Isenberg is a citizen of the State of Kentucky and was born on April 24, 1938. Plaintiff resides in the City of Glasgow, County of Barren.
- 154. Plaintiff Isenberg was exposed to Roundup[®] in Barren County, Kentucky, from 1980 to 2016, at his farm and home to control weeds around his crop fields, farm and home buildings, and property lines. He purchased Roundup[®] for use at farm and home from his local co-op in Glasgow.
- 155. Plaintiff Isenberg was exposed to Roundup[®] in Barren County, Kentucky, from 1980 to 2016, at numerous tracts of land, rental and investment properties he owned to control weeds. He purchased Roundup[®] for use at these properties from his local co-op in Glasgow.

- 156. In or about December 2015, Plaintiff Isenberg was diagnosed with NHL in Glasgow, Kentucky, at Health Partners Plantation, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 157. As a direct and proximate result of these injuries, Plaintiff Isenberg has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Isenberg has otherwise been damaged in a personal and pecuniary nature.
- 158. During the entire time that Plaintiff Isenberg was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Wayne James

- 159. Plaintiff Wayne James is a citizen of the State of Texas and was born on February3, 1952. Plaintiff James resides in the City of Stockdale, County of Wilson.
- 160. Plaintiff James was exposed to Roundup[®] in Adkins, Texas, from the early-1990s to 2000, at his approximately 18-acre cattle farm. He sprayed Roundup[®] along the fence lines, around flower beds, and around his home to control weeds. He sprayed approximately five to six times per month, year-round, and he used spray bottles or a hand-pump. He purchased Roundup[®] at a variety of local stores—both the pre-mixed type and the concentrate.
- 161. Plaintiff James was further exposed to Roundup[®] in Stockdale, Texas, from 2000 to approximately 2013 at his 228-acre cattle and hay farm. He applied Roundup[®] along the fence lines and in other locations on the farm, including around flower beds and around his

house. He applied it year-round, and he used a small bottle, hand pump, or an electric sprayer. He purchased Roundup[®] at a local store and Home Depot.

- 162. In or about January 2014, Plaintiff James was diagnosed with diffuse large B-cell lymphoma in San Antonio, Texas, at Methodist Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 163. As a direct and proximate result of these injuries, Plaintiff James has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff James has otherwise been damaged in a personal and pecuniary nature.
- 164. During the entire time that Plaintiff James was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Robert A. Jenkins

- 165. Plaintiff Robert A. Jenkins is a citizen of the State of Alabama and was born on December 23, 1957. Plaintiff resides in the City of Foley, County of Baldwin.
- 166. Plaintiff Jenkins was exposed to Roundup[®] at 506 Linda Court, Foley, Baldwin County, Alabama, from 2005 to 2016, while attempting to control weeds along the driveway, fence line, and garden. He purchased Roundup[®] for use at the home from the local co-op or garden store (e.g., Home Depot, Lowe's).
- 167. Plaintiff Jenkins was further exposed to Roundup[®] at 1213 Alston Street, Foley, Baldwin County, Alabama, from 1991 to 2016, at another residence to control weed growth. He

purchased Roundup[®] for use at their residence from the local co-op or garden store (e.g., Home Depot, Lowe's).

- 168. In or about May 2016, Plaintiff Jenkins was diagnosed with NHL and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 169. As a direct and proximate result of these injuries, Plaintiff Jenkins has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Jenkins has otherwise been damaged in a personal and pecuniary nature.
- 170. During the entire time that Plaintiff Jenkins was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.
- 171. Plaintiff Jenkins first learned that exposure to Roundup[®] can cause NHL and other serious illnesses sometime after his diagnosis in May 2016. Specifically, Plaintiff Jenkins reviewed documents related to IARC's evaluation of glyphosate.

Leslie L. Lalouette

- 172. Plaintiff Leslie L. Lalouette is a citizen of the State of Kansas and was born on April 30, 1948. Plaintiff Lalouette resides in the City of Florence, County of Marion.
- 173. Plaintiff Lalouette was exposed to Roundup[®] in Marion County, Kansas, from 1974 to 2012, at his farm and home to control weeds around all the barns, buildings, driveways, and yard. He purchased Roundup[®] for use at his farm and home from his local co-op and the Marion County Weed Department and other local suppliers.

- 174. Plaintiff Lalouette was further exposed to Roundup[®] in Marion County, Kansas, from 1996 to 2016, at his farm when he sprayed his crop fields. He purchased Roundup[®] for use at his farm from his local co-op, the Marion County Weed Department and other local suppliers.
- 175. In or about October 2013, Plaintiff Lalouette was diagnosed with NHL in Newton, Kansas, at Newton Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 176. As a direct and proximate result of these injuries, Plaintiff Lalouette has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Lalouette has otherwise been damaged in a personal and pecuniary nature.
- 177. During the entire time that Plaintiff Lalouette was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Marian Lange

- 178. Plaintiff Marian Lange is a citizen of the State of Michigan and was born on November 6, 1946. Plaintiff Lange resides in the City of Burton, County of Genesee.
- 179. Plaintiff Lange was exposed to Roundup[®] in Lapeer, Michigan, from1995 to 2005, and in Burton, Michigan, from 2005 to present while spraying Roundup[®] on her 10-acre property to control weed overgrowth. She would spot spray Roundup[®] with a hand-pump. She purchased Roundup[®] from Home Depot, Lowe's, and Wal-Mart.
- 180. In or about July 2001, Plaintiff Lange was diagnosed with NHL in Flint,
 Michigan, at McLaren Medical Center, and suffered the effects attendant thereto, as a direct and

proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 181. As a direct and proximate result of these injuries, Plaintiff Lange has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Lange has otherwise been damaged in a personal and pecuniary nature.
- 182. During the entire time that Plaintiff Lange was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Dominique J. Laster

- 183. Plaintiff Dominique J. Laster is a citizen of the State of Arkansas and was born on November 21, 1995. Plaintiff Laster resides in the City of Scott, County of Pulaski.
- 184. Plaintiff Laster was exposed to Roundup[®] in England, Arkansas, from the late 1990s to 2004, while working on his family's farm growing soybeans and corn. He worked alongside his grandfather from May through July when school was out. He would accompany his grandfather in the tractor spraying the crop fields with Roundup[®] and spot spraying with a handpump. They sprayed once or twice per week for the entire growing season.
- 185. Plaintiff Laster was further exposed from 2004 to 2013 while applying Roundup[®] at home to control weed overgrowth. He purchased Roundup[®] from local stores.
- 186. In or about August 2013, Plaintiff Laster was diagnosed with acute T-cell lymphoblastic lymphoma (an aggressive form of NHL) and acute T-cell lymphoblastic leukemia in Columbus, Georgia, at the Medical Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and

Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 187. As a direct and proximate result of these injuries, Plaintiff Laster has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Laster has otherwise been damaged in a personal and pecuniary nature.
- 188. During the entire time that Plaintiff Laster was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Jody L. Lindley

- 189. Plaintiff Jody L. Lindley is a citizen of the State of Oklahoma and was born on August 14, 1968. Plaintiff Lindley resides in the City of McAlester, County of Pittsburg.
- 190. Plaintiff Lindley was exposed to Roundup[®] in Savanna, Oklahoma, from 1982 to 2008, at home to control weeds along his driveway and yard. He purchased Roundup[®] for use at home from local stores like Walmart, Lowes and lumberyards.
- 191. Plaintiff Lindley was further exposed to Roundup[®] in Pittsburg County,
 Oklahoma, from 1996 to 2008, at rental and commercial properties he owned to control weed
 growth around the buildings and property. He purchased Roundup[®] for use at these properties
 from local stores like Walmart, Lowes and lumberyards.
- 192. Plaintiff Lindley was further exposed to Roundup[®] in Pittsburg County,
 Oklahoma, from 2008 to 2016, at home to control weed growth. He purchased Roundup[®] for
 use at home from local stores like Walmart, Lowes and lumberyards.
- 193. In or about March 2002, Plaintiff Lindley was diagnosed with Large B-Cell NHL in McAlester, Oklahoma, at McAlester Cancer Care, and suffered the effects attendant thereto, as

a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 194. As a direct and proximate result of these injuries, Plaintiff Lindley has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Lindley has otherwise been damaged in a personal and pecuniary nature.
- 195. During the entire time that Plaintiff Lindley was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Jimmy Lee Lindsay

- 196. Plaintiff Jimmy L. Lindsay is a citizen of the State of Mississippi and was born on October 22, 1946. Plaintiff resides in the City of Batesville, County of Panola.
- 197. Plaintiff Lindsay was exposed to Roundup[®] in Panola County, Mississippi, from the 1980 to 2016, at home and on his ranch to control weeds along the house exterior and fence line and across the property. He purchased Roundup[®] for use at home from his local co-op, Tractor Supply, various feed stores, and Lowe's.
- 198. In or about July 2012, Plaintiff Lindsay was diagnosed with NHL in Clarksdale, Mississippi, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 199. As a direct and proximate result of these injuries, Plaintiff Lindsay has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering

and loss of enjoyment of life, and Plaintiff Lindsay has otherwise been damaged in a personal and pecuniary nature.

200. During the entire time that Plaintiff Lindsay was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Carlos Luna

- 201. Plaintiff Carlos Luna is a citizen of the State of California and was born on October 16, 1959. He resides in the City of Turlock, County of Stanislaus.
- 202. Plaintiff Carlos Luna was exposed to Roundup[®] in Turlock, California from the year 1990 through 2013 while he applied Roundup[®] around the home to control weed overgrowth. He purchased Roundup[®] from the local Lowe's Home Improvement, Home Depot and Orchard Supplies.
- 203. In or about November 2013, Plaintiff Carlos Luna was diagnosed with NHL in Stockton, California at Kaiser Permanente, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 204. As a direct and proximate result of these injuries, Plaintiff Carlos Luna has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.
- 205. During the entire time that Plaintiff Carlos Luna was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Lloyd Martin

- 206. Plaintiff Lloyd Martin is a citizen of the State of Missouri and was born on January 12, 1947. He resides in Platte City, Missouri.
- 207. Plaintiff Martin was exposed to Roundup[®] in Platte City, Missouri, and Weston, Missouri, from 1980 to 2015, while he applied Roundup[®] around his farm and crops to control weed overgrowth. He purchased the Roundup at Plant Food Company in Weston, Missouri.
- 208. In or about March 2015, Plaintiff Martin was diagnosed with NHL in Kansas City, Kansas by Dr. Kakarala, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 209. As a direct and proximate result of these injuries, Plaintiff Martin has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.
- 210. During the entire time that Plaintiff Martin was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Kenneth T. Maynard

- 211. Plaintiff Kenneth T. Maynard is a citizen of the State of Kentucky and was born on December 3, 1937. Plaintiff resides in the City of Wingo, County of Graves.
- 212. Plaintiff Maynard was exposed to Roundup[®] in Graves County, Kentucky, from 1975 to 2016, at home to control weeds along the house and shed exteriors. He purchased Roundup[®] for use at home from a local store.

- 213. Plaintiff Maynard was further exposed to Roundup[®] in Grace County, Kentucky, from 1975 to 2000, while farming. He was exposed when mixing, loading and applying Roundup[®] to corn, soybean and wheat fields to control weed growth.
- 214. In or about February 1997, Plaintiff Maynard was diagnosed with Large B-Cell NHL in Paducah, Kentucky, at Paducah Cancer Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 215. As a direct and proximate result of these injuries, Plaintiff Maynard has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Maynard has otherwise been damaged in a personal and pecuniary nature.
- 216. During the entire time that Plaintiff Maynard was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Robert Mayo

- 217. Plaintiff Robert Mayo is a citizen of the State of Florida and was born onFebruary 19, 1953. He resides in the City of Apopka, County of Orange.
- 218. Plaintiff Mayo was exposed to Roundup[®] in Orlando, Florida, from 1995 to approximately July 2015 while he applied Roundup[®] around his property and acreage to control weed and grass overgrowth. In or about June 2015, Plaintiff Mayo was diagnosed with NHL in Orlando Florida by Dr. Sonalee Shroff, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and

Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 219. As a direct and proximate result of these injuries, Plaintiff Mayo has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.
- 220. During the entire time that Plaintiff Mayo was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Sally Gail Miracle

- 221. Plaintiff Sally Gail Miracle is a citizen of the State of Alabama and was born on June 20, 1947. Plaintiff resides in the City of Sumiton, County of Walker.
- 222. Plaintiff Miracle was exposed to Roundup[®] in Walker County, Alabama, from 2006 to 2016, at home to control weeds around her yard and in ditches, and to control brush and weeds in a large field in the back of her property. She purchased Roundup[®] for use at home from local stores like Home Depot and Lowes.
- 223. Plaintiff Miracle was further exposed to Roundup[®] in Walker County, Alabama, from 2004 to 2006, at home to control brush and weed growth. She purchased Roundup[®] for use at home from local stores like Home Depot and Lowes.
- 224. Plaintiff Miracle was further exposed to Roundup[®] in Woodhaven, Michigan, and nearby towns from 1990 to 2004, at home to control weed growth. She purchased Roundup[®] for use at home from local stores like Meijers and Home Depot.
- 225. In or about November 2015, Plaintiff Miracle was diagnosed with follicular lymphoma (a form of NHL) in Birmingham, Alabama, at UAB Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective

nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 226. As a direct and proximate result of these injuries, Plaintiff Miracle has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Miracle has otherwise been damaged in a personal and pecuniary nature.
- 227. During the entire time that Plaintiff Miracle was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Dustin Moffett

- 228. Plaintiff Dustin Moffett is a citizen of the State of Iowa and was born on December 13, 1970. He resides in the City of Estherville, County of Emmet.
- 229. Plaintiff Moffett was exposed to Roundup[®] in Iowa from 1984 through 1986, and again in 2007 while working in corn fields in and around southeast Iowa. He worked from April through July detasseling corn stalks. Corn fields were sprayed with Roundup[®] for the entire growing season. Tractors and planes sprayed overhead and in adjacent fields.
- 230. Plaintiff Moffett was further exposed to Roundup[®] in De Moines County, Iowa, from the mid-1970s through 1985, while working in and around his grandparents' garden to control weed growth. He worked alongside his grandparents from May through July when school was out.
- 231. In or about August 2013, Plaintiff Moffett was diagnosed with B-cell Lymphoma (the most common form of NHL) in Spencer, Iowa, at Spencer Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective

nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 232. As a direct and proximate result of these injuries, Plaintiff Moffett has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Moffett has otherwise been damaged in a personal and pecuniary nature.
- 233. During the entire time that Plaintiff Moffett was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Robert A. Moore

- 234. Plaintiff Robert A. Moore is a citizen of the State of Kentucky and was born on March 18, 1957. Plaintiff Moore resides in the City of Lebanon, County of Marion.
- 235. Plaintiff Moore was exposed to Roundup[®] in Bardstown, Kentucky, from 1978 to 2004 on his 5-acre farm, and in Lebanon, Kentucky, from 2004 to 2006 on his 25-acre farm, while applying Roundup[®] to control weed overgrowth. He applied Roundup[®] with a 3 gallon sprayer. He purchased Roundup[®] from Southern States, Bardstown Mills, and Walmart.
- 236. In or about June 2006, Plaintiff Moore was diagnosed with thymic lymphoma (a type of NHL) in Louisville, Kentucky, at Jewish Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 237. As a direct and proximate result of these injuries, Plaintiff Moore has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and

loss of enjoyment of life, and Plaintiff Moore has otherwise been damaged in a personal and pecuniary nature.

238. During the entire time that Plaintiff Moore was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Betty D. Morgan

- 239. Plaintiff Betty D. Morgan is a citizen of the State of Arizona and was born on March 2, 1938. Plaintiff resides in the City of Mesa, County of Maricopa.
- 240. Plaintiff Morgan was exposed to Roundup[®] in Maricopa County, Arizona, from 1999 to 2016, at home to control weeds in her yard. She purchased Roundup[®] for use at home from her local co-op or garden store (e.g., Home Depot, Lowe's).
- 241. In or about June 2011, Plaintiff Morgan was diagnosed with Large B-Cell NHL in Mesa, Arizona, at Ironwood Cancer Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 242. As a direct and proximate result of these injuries, Plaintiff Morgan has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Morgan has otherwise been damaged in a personal and pecuniary nature.
- 243. During the entire time that Plaintiff Morgan was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Harry Mossbarger

- 244. Plaintiff Harry Mossbarger is a citizen of the State of Ohio and was born on February 19, 1955. He resides in the City of Jeffersonville, County of Fayette.
- 245. Plaintiff Mossbarger was directly exposed to Roundup[®] from approximately the late-1980s through the mid-1990s, and from approximately 1999 through 2004, while working as a pesticide applicator for various employers throughout southern Ohio, including in the counties of Pickaway, Madison, and Franklin. In addition to applying Roundup[®], he mixed it, transported it, and repaired and maintained industrial equipment used to apply it to crops. He saw chemical containers with labels stating "Roundup[®]," and "Monsanto". On some work days, his clothes were saturated with Roundup[®].
- 246. In or about April 2004, Plaintiff Mossbarger was diagnosed with Stage IV follicular lymphoma (a type of NHL), and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 247. As a direct and proximate result of these injuries, Plaintiff Mossbarger has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.
- 248. During the entire time that Plaintiff Mossbarger was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Maria Pichardo

- 249. Plaintiff Maria Pichardo is a citizen of the State of Texas and was born on August4, 1975. She resides in the City of San Juan, County of Hidalgo.
- 250. From 1985 to 1987, Plaintiff Pichardo accompanied her parents to the fields in Maryland, from June through August. Her parents worked in corn and asparagus fields.

 Tractors sprayed along the rows in the fields, approximately once every two weeks. After the spraying, the rows were devoid of weeds. On information and belief, she was exposed to Roundup® during this time period.
- 251. From 1988 to 1992, starting when Plaintiff Pichardo was only twelve-years-old she worked from June through August in Maryland picking squash, tomatoes, and peppers. Tractors sprayed the crop fields, and nothing grew in the rows between the crops. Spray was also applied to blackberry weeds growing around the crops. At the end of the growing season in 1992, she saw that all of the crops were sprayed, turned yellow, and died shortly thereafter. On information and belief, she was exposed to Roundup[®] from 1988 to 1992 in Maryland.
- 252. From 1992 to 1995, Plaintiff Pichardo worked from June through August in Bird Island, Minnesota, picking various crops, including sugar beets, beans, corn, and cabbage. She observed spraying before crops were planted. She observed workers spraying around the crops with a backpack and hand pump, approximately twice per week. Her home was directly adjacent to the fields and, on information and belief, herbicide spray would drift onto and into her residence. On information and belief, she was exposed to Roundup[®] during this time period.
- 253. From 1996 to 2000, Plaintiff Pichardo worked from June through August in Maryland picking sugar beets and squash. She saw workers spraying with a backpack and hand

pump, and she saw tractors spraying the fields. On information and belief, she was exposed to Roundup[®] during this time period.

- 254. In 2000, Plaintiff Pichardo moved to San Juan, Texas. From 2000 through approximately 2014, she was exposed to Roundup[®], by using Roundup[®] concentrate, mixed with water, to kill weeds at home. She purchased the Roundup[®] concentrate at Home Depot and Lowe's. She sprayed during the summer, from April through August, once every two or three weeks, along her fence line. She used a backpack and a hand pump to spray.
- 255. On August 1, 2014, Plaintiff Pichardo was diagnosed with NHL in Mexico, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 256. As a direct and proximate result of these injuries, Plaintiff Pichardo has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and she has otherwise been damaged in a personal and pecuniary nature.
- 257. During the entire time that Plaintiff Pichardo was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Robert Priest

- 258. Plaintiff Robert Priest is a citizen of the State of Arizona and was born on October11, 1984. Plaintiff resides in the City of Oro Valley, County of Pima.
- 259. Plaintiff Priest was exposed to Roundup[®] in Pima County, Arizona, from 1999 to 2015 while working as a commercial landscaper. He sprayed Roundup[®] on a daily basis through

his employment treating client's yards. He also used at his own residence spraying for weeds on his residential property. Plaintiff Priest purchased Roundup[®] at various Home Depots located in the Tucson, Arizona metro area.

- 260. On or about August 19, 2015, Plaintiff Priest was diagnosed with Diffuse Large B-Cell lymphoma in Oro Valley, Arizona at Oro Valley Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 261. As a direct and proximate result of these injuries, Plaintiff Priest has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Priest has otherwise been damaged in a personal and pecuniary nature.
- 262. During the entire time that Plaintiff Priest was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Paulita Lozano De Ramirez, Jaime Ramirez, Jr. and Selena Ramirez, Individually and for Decedent Jaime Ramirez Garza

- 263. Plaintiff Paulita Lozano De Ramirez (a/k/a Paula Lozano) is a citizen of the State of Texas and was born on June 24, 1965. She resides in the City of Roma, County of Starr.
- 264. Plaintiff Lozano is the surviving spouse of Decedent Jaime Ramirez Garza ("Decedent Ramirez Garza"). Decedent Ramirez Garza was born on October 2, 1964, and he died on August 23, 2008. An underlying cause of his death was diffuse large B-cell lymphoma, the most common form of NHL.

- 265. Plaintiff Jaime Ramirez, Jr., ("Plaintiff Ramirez Jr.") is the surviving son of Decedent Ramirez and was born on August 20, 1989.
- 266. Plaintiff Selena Ramirez ("Plaintiff Selena") is the surviving daughter of Decedent Ramirez and was born on November 25, 1997.
- 267. Plaintiffs Lozano, Ramirez Jr., and Selena, are entitled to bring a wrongful death claim to compensate them for their individual injuries, including the loss of future care, maintenance, and support that Decedent Ramirez Garza would have provided them had he not died. Cal. Code Civ. Proc. § 377.60(a).
- 268. Plaintiff Lozano, in a representative capacity as Decedent Ramirez Garza's successor in interest, is entitled to institute and prosecute the product liability action that Decedent Ramirez could have brought were he alive. *Id.* §§ 377.20, 377.30.
- 269. From the mid-1970s to 1988, Decedent Ramirez Garza worked in cotton, onion, and tomato fields in Texas—picking vegetables and manually removing weeds. Crop fields were sprayed once or twice per week for the entire growing season. On information and belief, Decedent Ramirez Garza was exposed to Roundup[®] during this time period.
- 270. From 1988 to 1995, Decedent Ramirez Garza worked in Fresno, California, and Sanger, California, during the months of March through October. From March through May, he prepared grape vines and cotton fields before the growing season. Tractors and planes sprayed overhead to kill weeds. Decedent Ramirez Garza manually removed whatever was not killed by the spray. For the remainder of his time in California, he picked crops including grapes, peaches, plums, nectarines, and tomatoes. While he was picking, planes and tractors sprayed overhead. On information and belief, Decedent Ramirez Garza was routinely exposed to Roundup[®] during this time period.

- 271. Decedent Ramirez Garza was diagnosed with NHL in March 2006 in Texas, and suffered the effects attendant thereto, including death, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 272. As a direct and proximate result of these injuries, Decedent Ramirez Garza and/or his estate incurred medical expenses, endured loss of enjoyment of life, endured pain and suffering, and endured loss of life, and Plaintiff Decedent Ramirez Garza and/or his estate was otherwise damaged in a personal and/or pecuniary nature.
- 273. As a direct and proximate result of Decedent Ramirez Garza's death, Plaintiffs Lozano, Ramirez Jr., and Selena, have suffered and will suffer personal injury, including the loss of future care, maintenance, and support that Decedent Ramirez Garza would have provided them had he not died.
- 274. During the entire time that Decedent Ramirez Garza was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Ron T. Ramirez

- 275. Plaintiff Ron T. Ramirez is a citizen of the State of Arizona and was born on September 4, 1966. Plaintiff Ramirez resides in the City of Yuma, County of Yuma.
- 276. Plaintiff Ramirez has been exposed to Roundup[®] in Yuma, Arizona, from 1988 to present while working for the City of Yuma Parks and Recreation Department. He has been exposed when he and his crew sprayed Roundup[®] to control weed growth on and around city property. He has applied Roundup[®] with a backpack sprayer and a 100-gallon sprayer.

- 277. In or about January 2014, Plaintiff Ramirez was diagnosed with hairy cell leukemia (a type of NHL) in Yuma, Arizona, at Yuma Regional Medical Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 278. As a direct and proximate result of these injuries, Plaintiff Ramirez has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Ramirez has otherwise been damaged in a personal and pecuniary nature.
- 279. During the entire time that Plaintiff Ramirez was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Rosalia Reyes Sepulveda

- 280. Plaintiff Reyes Sepulveda is a citizen of the State of Texas and was born on December 22, 1947. She resides in the City of Rio Grande City, County of Starr.
- 281. Plaintiff Reyes Sepulveda was exposed to Roundup[®] in Dos Palos, California, and Firebaugh, California, from the mid-1970s to 1978 while working in onion, hay, alfalfa, cotton, tomato, and garlic fields. Crop fields were sprayed with Roundup[®] for the entire growing season. Tractors and planes sprayed overhead to kill weeds.
- 282. Plaintiff Reyes Sepulveda was further exposed to Roundup[®] in Rio Grande, Texas, and Mendoza, Texas, from 1978 to 1982 picking crops as tractors and planes sprayed overhead to kill weeds.

- 283. In or about May 2012, Plaintiff Reyes Sepulveda was diagnosed with follicular B-cell lymphoma (a type of NHL) in McAllen, Texas, at Texas Oncology-McAllen, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 284. As a direct and proximate result of these injuries, Plaintiff Reyes Sepulveda has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Reyes Sepulveda has otherwise been damaged in a personal and pecuniary nature.
- 285. During the entire time that Plaintiff Reyes Sepulveda was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Gloria Royster

- 286. Plaintiff Gloria Royster is a citizen of the State of Kentucky and was born on October 20, 1953. She resides in the City of Dixon, County of Webster.
- 287. Plaintiff Royster was exposed to Roundup[®] in Dixon, Kentucky, from the mid-1970s to 2016, while her spouse applied Roundup[®] around the home to control weed overgrowth. Her spouse purchased Roundup[®] from the local co-op.
- 288. In or about June 2002, Plaintiff Royster was diagnosed with anaplastic large T-cell lymphoma (a type of NHL) in Evansville, Indiana, at Deaconess Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research,

development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 289. As a direct and proximate result of these injuries, Plaintiff Royster has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and she has otherwise been damaged in a personal and pecuniary nature.
- 290. During the entire time that Plaintiff Royster was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Jerrod Sanders

- 291. Plaintiff Jerrod Sanders is a citizen of the State of Michigan and was born on December 29, 1974. He resides in the City of Alto, County of Kent.
- 292. Plaintiff Sanders was exposed to Roundup[®] in Cass County, Michigan, in the early 2000s to 2004, while working for the Natural Habitat Restoration Consulting Company. He worked clearing fields with Roundup[®] in order to plant trees.
- 293. Plaintiff Sanders was further exposed to Roundup[®] in Saranac, Michigan, and Alto, Michigan, from 2001 to 2015, while applying Roundup[®] at home to control weed overgrowth and Poison Ivy. He would purchase Roundup[®] for use at home from Myers, Home Depot, and Costco.
- 294. In or about September 2010, Plaintiff Sanders was diagnosed with Large B-cell Lymphoma (the most common form of NHL) in Grand Rapids, Michigan, at Spectrum Health Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and

negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 295. As a direct and proximate result of these injuries, Plaintiff Sanders has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Sanders has otherwise been damaged in a personal and pecuniary nature.
- 296. During the entire time that Plaintiff Sanders was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Kimberly Sewell

- 297. Plaintiff Kimberly Sewell is a citizen of the State of Mississippi and was born on January 11, 1967. She resides in the City of Greenville, County of Washington.
- 298. Plaintiff Sewell was exposed to Roundup[®] in Hinds County from the late 1970s to 1995, while working for multiple landscaping and nursery companies. She sprayed Roundup[®] in and around businesses to control weed overgrowth.
- 299. Plaintiff Sewell was further exposed to Roundup[®] in Madison, Mississippi, from 1995 to 2004 while applying Roundup[®] at home to control weeds and while applying it on her neighbor's residential property to control overgrowth. She purchased Roundup[®] from local stores.
- 300. In or about August 2001, Plaintiff Sewell was diagnosed with follicular center B-cell lymphoma (a type of NHL) in Jackson, Mississippi, at the Mississippi Baptist Medical Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and

negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 301. As a direct and proximate result of these injuries, Plaintiff Sewell has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and she has otherwise been damaged in a personal and pecuniary nature.
- 302. During the entire time that Plaintiff Sewell was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Edward Shackleford

- 303. Plaintiff Edward Shackleford is a citizen of the State of Mississippi and was born on March 22, 1938. Plaintiff Shackleford resides in the City of Ridgeland, County of Madison.
- 304. Plaintiff Shackleford was exposed to Roundup[®] in Washington County, Mississippi, at Shackleford Enterprises from the mid-1970s to 2005. He applied Roundup[®] from March to October while operating his 3,500-acre cotton, soybean, and corn farm. He used a tractor, hand-pump, and backpack to apply Roundup[®] to spot-spray fields and terminate vegetation. He purchased Roundup[®] for use at his business.
- 305. In or about April 2014, Plaintiff Shackleford was diagnosed with follicular B-cell lymphoma (a type of NHL) in Jackson, Mississippi, at St. Dominic-Jackson Memorial Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.

- 306. As a direct and proximate result of these injuries, Plaintiff Shackleford has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Shackleford has otherwise been damaged in a personal and pecuniary nature.
- 307. During the entire time that Plaintiff Shackleford was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Kurt Simmons

- 308. Plaintiff Kurt Simmons is a citizen of the State of Indiana and was born on December 14, 1959. Plaintiff resides in the City of Indianapolis, County of Marion.
- 309. Plaintiff Simmons was exposed to Roundup[®] in Delaware County, Indiana, from 1978 to 1981, while driving a truck spraying Roundup[®] to control weeds around crop fields. He purchased Roundup[®] from the local Farm Bureau Co-op.
- 310. Plaintiff Simmons was further exposed to Roundup[®] in Madison County, Indiana, from 1982 to 1990 at home to control weed growth. He purchased Roundup[®] for use at home from Walmart and local hardware stores.
- 311. Plaintiff Simmons was further exposed to Roundup[®] in Marion County, Indiana, from 1990 to 2016 at home to control weed growth. He purchased Roundup[®] for use at home from Home Depot and Lowes stores.
- 312. In or about 1996, Plaintiff Simmons was diagnosed with NHL in Indianapolis, Indiana, at Methodist Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 313. As a direct and proximate result of these injuries, Plaintiff Simmons has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Simmons has otherwise been damaged in a personal and pecuniary nature.
- 314. During the entire time that Plaintiff Simmons was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Dean A. Sinibaldi, Jr.

- 315. Plaintiff Dean Sinibaldi, Jr. ("Plaintiff Sinibaldi") is a citizen of the State of Florida and was born on January 3, 1986. Plaintiff Sinibaldi resides in the City of Cape Coral, County of Lee.
- 316. Plaintiff Sinibaldi was exposed to Roundup[®] in Cape Coral, Florida from 2006 to 2009 and then again from 2010 to 2012 while applying Roundup[®] at home to control weed overgrowth. He purchased Roundup[®] from Lowe's and Home Depot.
- 317. Plaintiff Sinibaldi was further exposed to Roundup[®] in Montgomery County,
 Tennessee, from 2009 to 2010 while working at a landscape company. He sprayed Roundup[®] at residential properties to control overgrowth.
- 318. In or about September 2014, Plaintiff Sinibaldi was diagnosed with diffuse large B-cell lymphoma (the most common form of NHL) in Fort Myers, Florida, at Florida Cancer Specialists, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 319. As a direct and proximate result of these injuries, Plaintiff Sinibaldi has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.
- 320. During the entire time that Plaintiff Sinibaldi was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

William Smith

- 321. Plaintiff William Smith is a citizen of the State of South Carolina and was born on March 2, 1939. He resides in the City of Union, County of Union.
- 322. Plaintiff William Smith was exposed to Roundup[®] in Union, South Carolina, from 2001 to approximately July 2016 while he applied Roundup[®] around the home to control weed and grass overgrowth. He purchased Roundup[®] from the WalMart and Paradise Home Center.
- 323. 168. In or about October 2013, Plaintiff William Smith was diagnosed with NHL in Spartanburg, South Carolina, at The Gibbs Cancer Center & Research Institute, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 324. As a direct and proximate result of these injuries, Plaintiff William Smith has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.

325. During the entire time that Plaintiff William Smith was exposed to Roundup®, he did not know that exposure to Roundup® was injurious to his health or the health of others.

Stacy Toepfer

- 326. Plaintiff Stacy Toepfer is a citizen of the State of Kansas and was born on June 3, 1967. Plaintiff resides in the City of Hays, County of Ellis.
- 327. Plaintiff Toepfer was exposed to Roundup[®] in Ellis County, Kansas, from approximately 1988 to 2005 at her home and farm to control weeds. She purchased Roundup at the Midland marketing Co-Op.
- 328. In or about August 30, 2001, Plaintiff Toepfer was diagnosed with Diffuse Large B-Cell NHL in Omaha, Nebraska, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 329. As a direct and proximate result of these injuries, Plaintiff Toepfer has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Toepfer has otherwise been damaged in a personal and pecuniary nature.
- 330. During the entire time that Plaintiff Toepfer was exposed to Roundup[®], she did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Brian Uhlich

331. Plaintiff Brian Uhlich is a citizen of the State of North Dakota and was born on February 17, 1953. Plaintiff resides in the City of Wahpeton, County of Richland.

- 332. Plaintiff Uhlich was exposed to Roundup[®] in Richland County, North Dakota, from approximately the early 1980's to 2015 at his home and farm to control weeds. He purchased Roundup for use at home from his local store (e.g., Home Depot, Lowe's).
- 333. In or about November 16, 2010, Plaintiff Uhlich was diagnosed with B-Cell follicular lymphoma, a subtype of NHL, in Fargo, North Dakota, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 334. As a direct and proximate result of these injuries, Plaintiff Uhlich has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Uhlich has otherwise been damaged in a personal and pecuniary nature.
- 335. During the entire time that Plaintiff Uhlich was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to her health or the health of others.

Joseph Velasquez

- 336. Plaintiff Joseph Velasquez is a citizen of the State of Florida and was born on July26, 1950. He resides in the City of Orlando, County of Orange.
- 337. Plaintiff Velasquez was exposed to Roundup® from 1977 to 1985 in Ohio while applying Roundup in and around his home to control weed overgrowth.
- 338. Plaintiff Velasquez was further exposed to Roundup[®] from 1985 to 1991 in Indiana while applying Roundup in and around his home to control weed overgrowth.

- 339. Plaintiff Velasquez was further exposed to Roundup[®] from 1991 to 1993 in Tennessee while applying Roundup in and around his home to control weed overgrowth.
- 340. Plaintiff Velasquez was further exposed to Roundup[®] from 1993 to 1994 in California while applying Roundup in and around his home to control weed overgrowth.
- 341. Plaintiff Velasquez was further exposed to Roundup[®] from 1994 to 2016 in Orlando, Florida while applying Roundup in and around his home to control weed overgrowth.
- 342. In or about October 2015, Plaintiff Velasquez was diagnosed with B-cell lymphoma (the most common form of NHL) in Kissimmee, Florida at Osceola Cancer Center, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup® and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup®.
- 343. As a direct and proximate result of these injuries, Plaintiff Velasquez has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Velasquez has otherwise been damaged in a personal and pecuniary nature.
- 344. During the entire time that Plaintiff Velasquez was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Kenneth E. Walls

345. Plaintiff Kenneth E. Walls is a citizen of the State of Mississippi and was born on August 5, 1954. Plaintiff Walls resides in the City of Greenwood, County of Leflore.

- 346. Plaintiff Walls was further exposed to Roundup[®] in Leflore County, Mississippi, from 1980 to 2016 at home to control weed growth. He purchased Roundup[®] for use at home from the Lawrence County Exchange, Home Depot, and Lowe's.
- 347. In or about October 2012, Plaintiff Walls was diagnosed with NHL in Jackson, Mississippi, at Baptist Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 348. As a direct and proximate result of these injuries, Plaintiff Walls has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Walls has otherwise been damaged in a personal and pecuniary nature.
- 349. During the entire time that Plaintiff Walls was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

LaTwon Whitby

- 350. Plaintiff LaTwon Whitby is a citizen of the State of Arkansas and was born on May 9, 1968. Plaintiff Whitby resides in the City of Forrest City, County of St. Francis.
- 351. Plaintiff Whitby was exposed to Roundup[®] in St. Francis County, Arkansas, from 1990 to 2012, while working on his property. He was exposed when mixing, loading and applying Roundup[®] on the six-acre property to control weed growth across the property and in the garden. He purchased Roundup[®] for use on his property at his local co-op.
- 352. In or about April 2012, Plaintiff Whitby was diagnosed with NHL in Jonesboro, Arkansas, and suffered the effects attendant thereto, as a direct and proximate result of the

unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 353. As a direct and proximate result of these injuries, Plaintiff Whitby has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Whitby has otherwise been damaged in a personal and pecuniary nature.
- 354. During the entire time that Plaintiff Whitby was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Guy Wicker

- 355. Plaintiff Guy Wicker is a citizen of the State of Louisiana and was born on June 14, 1945. Plaintiff Wicker resides in the City of New Orleans, Louisiana.
- 356. Plaintiff Wicker was exposed to Roundup[®] in Orlando, Florida, from 2001 to 2014 at his home to control weeds around his property. He purchased Roundup[®] for use at his local hardware store.
- 357. Plaintiff Wicker was also exposed to Roundup[®] in New Orleans, Louisiana, from 2014 to 2016, at his home to control weeds around his property.
- 358. In or about March 2016, Plaintiff Wicker was diagnosed with NHL in New Orleans, Louisiana at Ochsner Hospital, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].

- 359. As a direct and proximate result of these injuries, Plaintiff Wicker has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and Plaintiff Wicker has otherwise been damaged in a personal and pecuniary nature.
- 360. During the entire time that Plaintiff Wicker was exposed to Roundup[®], he did not know that exposure to Roundup[®] was injurious to his health or the health of others.

Ruben Yanes

- 361. Plaintiff Ruben Yanes is a citizen of the State of Florida and was born on November 13, 1971. He resides in the City of Miami, County of Miami-Dade.
- 362. Plaintiff Ruben Yanes was exposed to Roundup[®] in Miami, Florida, from 2002 to 2016 while he applied Roundup[®] around the home to control weed overgrowth. He purchased Roundup[®] from the Home Depo in Miami.
- 363. In or about October 2015, Plaintiff Ruben Yates was diagnosed with mantle B cell lymphoma (a type of NHL) in Miami, Florida, at Advanced Medical Specialties, and suffered the effects attendant thereto, as a direct and proximate result of the unreasonably dangerous and defective nature of Roundup[®] and Defendant's wrongful and negligent conduct in the research, development, testing, manufacture, production, promotion, distribution, marketing, and sale of Roundup[®].
- 364. As a direct and proximate result of these injuries, Plaintiff Ruben Yanes has incurred and will incur medical expenses in the future and has endured and will endure pain and suffering and loss of enjoyment of life, and he has otherwise been damaged in a personal and pecuniary nature.

365. During the entire time that Plaintiff Ruben Yanes was exposed to Roundup®, he did not know that exposure to Roundup® was injurious to his health or the health of others.

DEFENDANT MONSANTO

- 366. Defendant Monsanto is a Delaware corporation with its headquarters and principal place of business in St. Louis, Missouri. At all relevant times, Monsanto also regularly conducted, transacted, and solicited business in St. Louis, Missouri, as well as in all States of the United States. Monsanto's world headquarters are located at 800 Lindbergh Boulevard in St. Louis County, Missouri.
- 367. At all times relevant to this complaint, Monsanto was the entity that discovered the herbicidal properties of glyphosate and the manufacturer of Roundup[®], which contains the active ingredient glyphosate and the surfactant POEA, as well as adjuvants and other "inert" ingredients. On information and belief, important scientific, manufacturing, marketing, sales, and other business decisions regarding Roundup[®] were made from and in the State of Missouri.
- 368. At all times relevant to this complaint, Monsanto was engaged in the business of manufacturing, marketing, testing, promoting, selling, and/or distributing Roundup[®] in the State of Missouri.
- 369. At all relevant times, Monsanto had, and continues to have, regular and systematic contact with and conducts business in and from the State of Missouri, such that it has purposefully availed itself of the laws of the State and expects to both sue and be sued in Missouri. In the alternative, Monsanto's presence in the State of Missouri satisfies the due process requirements for Missouri courts to exercise jurisdiction over it. In the alternative, Monsanto's domicile in the State of Missouri satisfies the due process requirements for Missouri courts to exercise jurisdiction over it. In the alternative, Monsanto has consented to the exercise

of jurisdiction over it by Missouri courts by registering to and conducting business from the State of Missouri.

VENUE

- 370. Mo. Rev. Stat. § 508.010.4, Missouri's general venue statute, provides:
 - Notwithstanding any other provisions of law, in all actions in which there is any count alleging a tort and in which the plaintiff was first injured in the state of Missouri, venue shall be in the county where the plaintiff was first injured by the wrongful acts or negligent conduct alleged in the action
- 371. Plaintiff Timothy Kane was residing and working in the city of St. Louis City when he was first exposed to and injured by Roundup[®], and therefore was "first injured by the wrongful acts or negligent conduct alleged" in this action in the city of St. Louis, Missouri. Therefore, venue is proper pursuant to Mo. Rev. Stat. § 508.010.4.
- 372. Venue is further proper in this Court pursuant to Mo. Rev. Stat. § 508.010.4 because Plaintiff Timothy Kane, at all relevant times, was exposed to and used Roundup[®] in the city of St. Louis, Missouri.

ALLEGATIONS COMMON TO ALL COUNTS

373. In 1970, Defendant Monsanto Company, Inc. ("Monsanto") discovered the herbicidal properties of glyphosate and began marketing it in products in 1974 under the brand name Roundup[®]. Roundup[®] is a non-selective herbicide used to kill weeds that commonly compete with the growing of crops. In addition to the active ingredient glyphosate, Roundup[®] contains the surfactant Polyethoxylated tallow amine (POEA) and/or adjuvants and other so-called "inert" ingredients. In 2001, glyphosate was the most-used pesticide active ingredient in

American agriculture with 85–90 million pounds used annually. That number grew to 185 million pounds in 2007.¹ As of 2013, glyphosate was the world's most widely used herbicide.

- 374. Monsanto is a multinational agricultural biotechnology corporation based in St. Louis, Missouri, and incorporated in Delaware. It is the world's leading producer of glyphosate. As of 2009, Monsanto was the world's leading producer of seeds, accounting for 27% of the world seed market.² The majority of these seeds are of the Roundup Ready[®] brand. The stated advantage of Roundup Ready[®] crops is that they substantially improve a farmer's ability to control weeds, because glyphosate can be sprayed in the fields during the growing season without harming the crops. In 2010, an estimated 70% of corn and cotton and 90% of soybean fields in the United States were Roundup Ready[®].³
- 375. Monsanto's glyphosate products are registered in 130 countries and approved for use on over 100 different crops.⁴ They are ubiquitous in the environment. Numerous studies confirm that glyphosate is found in rivers, streams, and groundwater in agricultural areas where Roundup[®] is used.⁵ It has been found in food,⁶ in the urine of agricultural

¹ Arthur Grube et al., U.S. Envtl. Prot. Agency, *Pesticides Industry Sales and Usage*, 2006–2007 *Market Estimates* 14 (2011), *available at* http://www.epa.gov/pesticides/pestsales/07pestsales/market estimates2007.pdf.

² ETC Group, *Who Will Control the Green Economy?* 22 (2011), *available at* http://www.etcgroup.org/files/publication/pdf file/ETC wwctge 4web Dec2011.pdf.

³ William Neuman & Andrew Pollack, *Farmers Cope With Roundup-Resistant Weeds*, N.Y. TIMES, May 3, 2010, *available at* http://www.nytimes.com/2010/05/04/business/energy-environment/04weed.html?pagewan.

⁴ Monsanto, *Backgrounder-History of Monsanto's Glyphosate Herbicides* (Sep. 2, 2015), http://www.monsanto.com/products/documents/glyphosate-background-materials/back_history.pdf.

⁵ See U.S. Geological Survey, USGS Technical Announcement: Widely Used Herbicide Commonly Found in Rain and Streams in the Mississippi River Basin (2011), available at http://www.usgs.gov/newsroom/article.asp?ID=2909; see also U.S. Envtl. Prot. Agency, Technical Factsheet on: Glyphosate, available at http://www.epa.gov/safewater/pdfs/factsheets/soc/tech/glyphosa.pdf.

workers, ⁷ and even in the urine of urban dwellers who are not in direct contact with glyphosate. ⁸

- 376. On March 20, 2015, the International Agency for Research on Cancer ("IARC"), an agency of the World Health Organization ("WHO"), issued an evaluation of several herbicides, including glyphosate. That evaluation was based, in part, on studies of exposures to glyphosate in several countries around the world, and it traces the health implications from exposure to glyphosate since 2001.
- 377. On July 29, 2015, IARC issued the formal monograph relating to glyphosate. In that monograph, the IARC Working Group provides a thorough review of the numerous studies and data relating to glyphosate exposure in humans.
- 378. The IARC Working Group classified glyphosate as a Group 2A herbicide, which means that it is *probably carcinogenic to humans*. The IARC Working Group concluded that the cancers most associated with glyphosate exposure are NHL and other haematopoietic cancers, including lymphocytic lymphoma / chronic lymphocytic leukemia, B-cell lymphoma, and multiple myeloma.⁹
- 379. The IARC evaluation is significant. It confirms what has been believed for years: that glyphosate is toxic to humans.

⁶ Thomas Bohn et al., *Compositional Differences in Soybeans on the Market: Glyphosate Accumulates in Roundup Ready GM Soybeans*, 153 FOOD CHEMISTRY 207 (2013), *available at* http://www.sciencedirect.com/science/article/pii/S0308814613019201.

⁷ John F. Acquavella et al., *Glyphosate Biomonitoring for Farmers and Their Families: Results from the Farm Family Exposure Study*, 112(3) ENVTL. HEALTH PERSPECTIVES 321 (2004), *available at* http://www.ncbi.nlm.nih.gov/pmc/articles/PMC1241861/; Kathryn Z. Guyton et al., *Carcinogenicity of Tetrachlorvinphos, Parathion, Malathion, Diazinon & Glyphosate*, 112 IARC Monographs 76, section 5.4 (2015), *available at* http://dx.doi.org/10.1016/S1470-2045(15)70134-8.

⁸ Dirk Brändli & Sandra Reinacher, *Herbicides found in Human Urine*, 1 ITHAKA JOURNAL 270 (2012), *available at* http://www.ithaka-journal.net/druckversionen/e052012-herbicides-urine.pdf.

 $^{^9}$ See Guyton et al., Carcinogenicity of Tetrachlorvinphos, Parathion, Malathion, Diazinon & Glyphosate, supra.

380. Nevertheless, Monsanto, since it began selling Roundup[®], has represented it as safe to humans and the environment. Indeed, Monsanto has repeatedly proclaimed and continues to proclaim to the world, and particularly to United States consumers, that glyphosate-based herbicides, including Roundup[®], create no unreasonable risks to human health or to the environment.

FACTS

- 381. Glyphosate is a broad-spectrum, non-selective herbicide used in a wide variety of herbicidal products around the world.
- 382. Plants treated with glyphosate translocate the systemic herbicide to their roots, shoot regions, and fruit, where it interferes with the plant's ability to form aromatic amino acids necessary for protein synthesis. Treated plants generally die within two to three days. Because plants absorb glyphosate, it cannot be completely removed by washing or peeling produce or by milling, baking, or brewing grains.
- 383. For nearly 40 years, farms across the world have used Roundup[®] without knowing of the dangers its use poses. That is because when Monsanto first introduced Roundup[®], it touted glyphosate as a technological breakthrough: it could kill almost every weed without causing harm either to people or to the environment. Of course, history has shown that not to be true. According to the WHO, the main chemical ingredient of Roundup[®]—glyphosate—is a probable cause of cancer. Those most at risk are farm workers and other individuals with workplace exposure to Roundup[®], such as garden center workers, nursery workers, and landscapers. Agricultural workers are, once again, victims of corporate greed. Monsanto assured the public that Roundup[®] was harmless. In order to prove this, Monsanto has championed falsified data and has attacked legitimate studies that revealed

Roundup[®]'s dangers. Monsanto has led a prolonged campaign of misinformation to convince government agencies, farmers and the general population that Roundup[®] is safe.

The Discovery of Glyphosate and Development of Roundup®

- 384. The herbicidal properties of glyphosate were discovered in 1970 by Monsanto chemist John Franz. The first glyphosate-based herbicide was introduced to the market in the mid-1970s under the brand name Roundup[®]. From the outset, Monsanto marketed Roundup[®] as a "safe" general-purpose herbicide for widespread commercial and consumer use. It still markets Roundup[®] as safe today. ¹¹
- 385. In addition to the active ingredient glyphosate, Roundup[®] formulations also contain adjuvants and other chemicals, such as the surfactant POEA, which are considered "inert" and therefore protected as "trade secrets" in manufacturing. Growing evidence suggests that these adjuvants and additional components of Roundup[®] formulations are not, in fact, inert and are toxic in their own right.

Registration of Herbicides under Federal Law

- 386. The manufacture, formulation, and distribution of herbicides, such as Roundup[®], are regulated under the Federal Insecticide, Fungicide, and Rodenticide Act ("FIFRA" or "Act"), 7 U.S.C. § 136 *et seq.* FIFRA requires that all pesticides be registered with the Environmental Protection Agency ("EPA" or "Agency") prior to their distribution, sale, or use, except as described by the Act. 7 U.S.C. § 136a(a).
- 387. Because pesticides are toxic to plants, animals, and humans, at least to some degree, the EPA requires as part of the registration process, among other things, a variety of

¹⁰ Monsanto, *Backgrounder, History of Monsanto's Glyphosate Herbicide* (Sep. 2, 2015), http://www.monsanto.com/products/documents/glyphosate-background-materials/back_history.pdf.

¹¹ Monsanto, *What is Glyphosate?* (Sep. 2, 2015), http://www.monsanto.com/sitecollectiondocuments/glyphosate-safety-health.pdf.

tests to evaluate the potential for exposure to pesticides, toxicity to people and other potential non-target organisms, and other adverse effects on the environment. Registration by the EPA, however, is not an assurance or finding of safety. The determination the Agency must make in registering or re-registering a product is not that the product is "safe," but rather that use of the product in accordance with its label directions "will not generally cause unreasonable adverse effects on the environment." 7 U.S.C. § 136a(c)(5)(D).

- 388. FIFRA defines "unreasonable adverse effects on the environment" to mean "any unreasonable risk to man or the environment, taking into account the economic, social, and environmental costs and benefits of the use of any pesticide." 7 U.S.C. § 136(bb). FIFRA thus requires EPA to make a risk/benefit analysis in determining whether a registration should be granted or a pesticide allowed to continue to be sold in commerce.
- 389. The EPA and the State of California registered Roundup[®] for distribution, sale, and manufacture in the United States and the State of California.
- 390. FIFRA generally requires that the registrant, Monsanto in the case of Roundup[®], conducts the health and safety testing of pesticide products. The EPA has protocols governing the conduct of tests required for registration and the laboratory practices that must be followed in conducting these tests. The data produced by the registrant must be submitted to the EPA for review and evaluation. The government is not required, nor is it able, however, to perform the product tests that are required of the manufacturer.
- 391. The evaluation of each pesticide product distributed, sold, or manufactured is completed at the time the product is initially registered. The data necessary for registration of a pesticide has changed over time. The EPA is now in the process of re-evaluating all pesticide products through a Congressionally-mandated process called "re-registration." 7 U.S.C.

- § 136a-1. In order to reevaluate these pesticides, the EPA is demanding the completion of additional tests and the submission of data for the EPA's recent review and evaluation.
- 392. In the case of glyphosate, and therefore Roundup[®], the EPA had planned on releasing its preliminary risk assessment—in relation to the reregistration process—no later than July 2015. The EPA completed its review of glyphosate in early 2015, but it delayed releasing the risk assessment pending further review in light of the WHO's health-related findings.

Scientific Fraud Underlying the Marketing and Sale of Glyphosate/Roundup®

- 393. Based on early studies showing that glyphosate could cause cancer in laboratory animals, the EPA originally classified glyphosate as *possibly carcinogenic to humans* (Group C) in 1985. After pressure from Monsanto, including contrary studies it provided to the EPA, the EPA changed its classification to *evidence of non-carcinogenicity in humans* (Group E) in 1991. In so classifying glyphosate, however, the EPA made clear that the designation did not mean the chemical does not cause cancer: "It should be emphasized, however, that designation of an agent in Group E is based on the available evidence at the time of evaluation and should not be interpreted as a definitive conclusion that the agent will not be a carcinogen under any circumstances."
- 394. On two occasions, the EPA found that the laboratories hired by Monsanto to test the toxicity of its Roundup[®] products for registration purposes committed fraud.
- 395. In the first instance, Monsanto, in seeking initial registration of Roundup[®] by the EPA, hired Industrial Bio-Test Laboratories ("IBT") to perform and evaluate pesticide

¹² U.S. Envtl. Prot. Agency, *Memorandum, Subject: SECOND Peer Review of Glyphosate* 1 (1991), *available at* http://www.epa.gov/pesticides/chem_search/cleared_reviews/csr_PC-103601_30-Oct-91 265.pdf.

toxicology studies relating to Roundup[®]. ¹³ IBT performed about 30 tests on glyphosate and glyphosate-containing products, including nine of the 15 residue studies needed to register Roundup[®].

396. In 1976, the United States Food and Drug Administration ("FDA") performed an inspection of IBT that revealed discrepancies between the raw data and the final report relating to the toxicological impacts of glyphosate. The EPA subsequently audited IBT; it too found the toxicology studies conducted for the Roundup® herbicide to be invalid. An EPA reviewer stated, after finding "routine falsification of data" at IBT, that it was "hard to believe the scientific integrity of the studies when they said they took specimens of the uterus from male rabbits."

- 397. Three top executives of IBT were convicted of fraud in 1983.
- 398. In the second incident of data falsification, Monsanto hired Craven Laboratories in 1991 to perform pesticide and herbicide studies, including for Roundup[®]. In that same year,

¹³ Monsanto, *Backgrounder, Testing Fraud: IBT and Craven Laboratories* (Sep. 2, 2015), http://www.monsanto.com/products/documents/glyphosate-background-materials/ibt_craven_bkg.pdf.

¹⁴ U.S. Envtl. Prot. Agency, Summary of the IBT Review Program Office of Pesticide Programs (1983), available at http://nepis.epa.gov/Exe/ZyNET.exe/91014ULV.TXT?ZyActionD=ZyDocument&Client=EPA&Index=1981+Thru+1985&Docs=&Query=&Time=&EndTime=&SearchMethod=1&TocRestrict=n&Toc=&TocEntry=&QFieldPear=&QFieldMonth=&QFieldDay=&IntQFieldOp=0&ExtQFieldOp=0&XmlQuery=&File=D%3A%5Czyfiles%5CIndex%20Data%5C81thru85%5CTxt%5C00000022%5C91014ULV.txt&User=ANONYMOUS&Password=anonymous&SortMethod=h%7C-&MaximumDocuments=1&FuzzyDegree=0&ImageQuality=r75g8/r75g8/x150y150g16/i425&Display=p%7Cf&DefSeekPage=x&SearchBack=ZyActionL&Back=ZyActionS&BackDesc=Results%20page&

MaximumPages=1&ZyEntry=1&SeekPage=x&ZyPURL.

15 Marie-Monique Robin, *The World According to Monsanto: Pollution, Corruption and the Control of the World's Food Supply* (2011) (citing U.S. Envtl. Prot. Agency, *Data Validation, Memo*

Control of the World's Food Supply (2011) (citing U.S. Envtl. Prot. Agency, Data Validation, Memo from K. Locke, Toxicology Branch, to R. Taylor, Registration Branch. Washington, D.C. (August 9, 1978)).

the owner of Craven Laboratories and three of its employees were indicted, and later convicted, of fraudulent laboratory practices in the testing of pesticides and herbicides.¹⁶

399. Despite the falsity of the tests that underlie its registration, within a few years of its launch, Monsanto was marketing Roundup[®] in 115 countries.

The Importance of Roundup® to Monsanto's Market Dominance Profits

- 400. The success of Roundup[®] was key to Monsanto's continued reputation and dominance in the marketplace. Largely due to the success of Roundup[®] sales, Monsanto's agriculture division was out-performing its chemicals division's operating income, and that gap increased yearly. But with its patent for glyphosate expiring in the United States in the year 2000, Monsanto needed a strategy to maintain its Roundup[®] market dominance and to ward off impending competition.
- 401. In response, Monsanto began the development and sale of genetically engineered Roundup Ready® seeds in 1996. Since Roundup Ready® crops are resistant to glyphosate, farmers can spray Roundup® onto their fields during the growing season without harming the crop. This allowed Monsanto to expand its market for Roundup® even further; by 2000, Monsanto's biotechnology seeds were planted on more than 80 million acres worldwide and nearly 70% of American soybeans were planted from Roundup Ready® seeds. It also secured Monsanto's dominant share of the glyphosate/Roundup® market through a marketing strategy that coupled proprietary Roundup Ready® seeds with continued sales of its Roundup® herbicide.
- 402. Through a three-pronged strategy of increasing production, decreasing prices, and by coupling with Roundup Ready[®] seeds, Roundup[®] became Monsanto's most profitable

¹⁶ Monsanto, Backgrounder, Testing Fraud: IBT and Craven Laboratories, supra.

product. In 2000, Roundup[®] accounted for almost \$2.8 billion in sales, outselling other herbicides by a margin of five to one, and accounting for close to half of Monsanto's revenue.¹⁷ Today, glyphosate remains one of the world's largest herbicides by sales volume.

Monsanto has known for decades that it falsely advertises the safety of Roundup®

- 403. In 1996, the New York Attorney General ("NYAG") filed a lawsuit against Monsanto based on its false and misleading advertising of Roundup[®] products. Specifically, the lawsuit challenged Monsanto's general representations that its spray-on glyphosate-based herbicides, including Roundup[®], were "safer than table salt" and "practically non-toxic" to mammals, birds, and fish. Among the representations the NYAG found deceptive and misleading about the human and environmental safety of glyphosate and/or Roundup[®] are the following:
 - a) "Remember that environmentally friendly Roundup herbicide is biodegradable. It won't build up in the soil so you can use Roundup with confidence along customers' driveways, sidewalks and fences ..."
 - b) "And remember that Roundup is biodegradable and won't build up in the soil. That will give you the environmental confidence you need to use Roundup everywhere you've got a weed, brush, edging or trimming problem."
 - c) "Roundup biodegrades into naturally occurring elements."
 - d) "Remember that versatile Roundup herbicide stays where you put it. That means there's no washing or leaching to harm customers' shrubs or other desirable vegetation."
 - e) "This non-residual herbicide will not wash or leach in the soil. It ... stays where you apply it."

¹⁷ David Barboza, *The Power of Roundup; A Weed Killer Is A Block for Monsanto to Build On*, N.Y. TIMES, Aug. 2, 2001, *available at* http://www.nytimes.com/2001/08/02/business/the-power-of-roundup-a-weed-killer-is-a-block-for-monsanto-to-build-on.html.

- f) "You can apply Accord with 'confidence because it will stay where you put it' it bonds tightly to soil particles, preventing leaching. Then, soon after application, soil microorganisms biodegrade Accord into natural products."
- g) "Glyphosate is less toxic to rats than table salt following acute oral ingestion."
- h) "Glyphosate's safety margin is much greater than required. It has over a 1,000-fold safety margin in food and over a 700-fold safety margin for workers who manufacture it or use it."
- i) "You can feel good about using herbicides by Monsanto. They carry a toxicity category rating of 'practically non-toxic' as it pertains to mammals, birds and fish."
- j) "Roundup can be used where kids and pets will play and breaks down into natural material." This ad depicts a person with his head in the ground and a pet dog standing in an area which has been treated with Roundup. 18
- 404. On November 19, 1996, Monsanto entered into an Assurance of Discontinuance with NYAG, in which Monsanto agreed, among other things, "to cease and desist from publishing or broadcasting any advertisements [in New York] that represent, directly or by implication" that:
 - a) its glyphosate-containing pesticide products or any component thereof are safe, non-toxic, harmless or free from risk.

* * *

b) its glyphosate-containing pesticide products or any component thereof manufactured, formulated, distributed or sold by Monsanto are biodegradable

* * *

c) its glyphosate-containing pesticide products or any component thereof stay where they are applied under all

¹⁸ Attorney General of the State of New York, In the Matter of Monsanto Company, Assurance of Discontinuance Pursuant to Executive Law § 63(15) (Nov. 1996).

circumstances and will not move through the environment by any means.

* * *

d) its glyphosate-containing pesticide products or any component thereof are "good" for the environment or are "known for their environmental characteristics."

* * *

- e) glyphosate-containing pesticide products or any component thereof are safer or less toxic than common consumer products other than herbicides;
- f) its glyphosate-containing products or any component thereof might be classified as "practically non-toxic."
- 405. Monsanto did not alter its advertising in the same manner in any state other than New York, and on information and belief it still has not done so today.
- 406. In 2009, France's highest court ruled that Monsanto had not told the truth about the safety of Roundup[®]. The French court affirmed an earlier judgement that Monsanto had falsely advertised its herbicide Roundup[®] as "biodegradable" and that it "left the soil clean."

Classifications and Assessments of Glyphosate

407. The IARC process for the classification of glyphosate followed IARC's stringent procedures for the evaluation of a chemical agent. Over time, the IARC Monograph program has reviewed 980 agents. Of those reviewed, it has determined 116 agents to be Group 1 (Known Human Carcinogens); 73 agents to be Group 2A (Probable Human Carcinogens); 287 agents to be Group 2B (Possible Human Carcinogens); 503 agents to be Group 3 (Not Classified); and one agent to be Probably Not Carcinogenic.

¹⁹ *Monsanto Guilty in 'False Ad' Row*, BBC, Oct. 15, 2009, *available at* http://news.bbc.co.uk/2/hi/europe/8308903.stm.

- 408. The established procedure for IARC Monograph evaluations is described in the IARC Programme's Preamble.²⁰ Evaluations are performed by panels of international experts, selected on the basis of their expertise and the absence of actual or apparent conflicts of interest.
- 409. One year before the Monograph meeting, the meeting is announced and there is a call both for data and for experts. Eight months before the Monograph meeting, the Working Group membership is selected and the sections of the Monograph are developed by the Working Group members. One month prior to the Monograph meeting, the call for data is closed and the various draft sections are distributed among Working Group members for review and comment. Finally, at the Monograph meeting, the Working Group finalizes review of all literature, evaluates the evidence in each category, and completes the overall evaluation. Within two weeks after the Monograph meeting, the summary of the Working Group findings are published in *The Lancet Oncology*, and within a year after the meeting, the finalized Monograph is published.
- 410. In assessing an agent, the IARC Working Group reviews the following information: (a) human, experimental, and mechanistic data; (b) all pertinent epidemiological studies and cancer bioassays; and (c) representative mechanistic data. The studies must be publicly available and have sufficient detail for meaningful review, and reviewers cannot be associated with the underlying study.
- 411. In March 2015, IARC reassessed glyphosate. The summary published in *The Lancet Oncology* reported that glyphosate is a Group 2A agent and probably carcinogenic in humans.

²⁰ World Health Org., *IARC Monographs on the Evaluation of Carcinogenic Risks to Humans: Preamble* (2006), available at http://monographs.iarc.fr/ENG/Preamble/CurrentPreamble.pdf.

- 412. On July 29, 2015, IARC issued its Monograph for glyphosate, Monograph Volume 112. For Volume 112, a Working Group of 17 experts from 11 countries met at IARC from March 3–10, 2015 to assess the carcinogenicity of certain herbicides, including glyphosate. The March meeting culminated a nearly one-year review and preparation by the IARC Secretariat and the Working Group, including a comprehensive review of the latest available scientific evidence. According to published procedures, the Working Group considered "reports that have been published or accepted for publication in the openly available scientific literature" as well as "data from governmental reports that are publicly available."
- 413. The studies considered the following exposure groups: (1) occupational exposure of farmers and tree nursery workers in the United States, forestry workers in Canada and Finland and municipal weed-control workers in the United Kingdom; and (2) paraoccupational exposure in farming families.
- 414. Glyphosate was identified as the second-most used household herbicide in the United States for weed control between 2001 and 2007 and the most heavily used herbicide in the world in 2012.
- 415. Exposure pathways are identified as air (especially during spraying), water, and food. Community exposure to glyphosate is widespread and found in soil, air, surface water, and groundwater, as well as in food.
- 416. The assessment of the IARC Working Group identified several case control studies of occupational exposure in the United States, Canada, and Sweden. These studies show a human health concern from agricultural and other work-related exposure to glyphosate.

- 417. The IARC Working Group found an increased risk between exposure to glyphosate and NHL and several subtypes of NHL, and the increased risk persisted after adjustment for other pesticides.
- 418. The IARC Working Group also found that glyphosate caused DNA and chromosomal damage in human cells. One study in community residents reported increases in blood markers of chromosomal damage (micronuclei) after glyphosate formulations were sprayed.
- 419. In male CD-1 mice, glyphosate induced a positive trend in the incidence of a rare tumor: renal tubule carcinoma. A second study reported a positive trend for haemangiosarcoma in male mice. Glyphosate increased pancreatic islet-cell adenoma in male rats in two studies. A glyphosate formulation promoted skin tumors in an initiation-promotion study in mice.
- 420. The IARC Working Group also noted that glyphosate has been detected in the urine of agricultural workers, indicating absorption. Soil microbes degrade glyphosate to aminomethylphosphoric acid (AMPA). Blood AMPA detection after exposure suggests intestinal microbial metabolism in humans.
- 421. The IARC Working Group further found that glyphosate and glyphosate formulations induced DNA and chromosomal damage in mammals, and in human and animal cells in utero.
- 422. The IARC Working Group also noted genotoxic, hormonal, and enzymatic effects in mammals exposed to glyphosate.²¹ Essentially, glyphosate inhibits the biosynthesis

 $^{^{21}}$ Guyton et al., Carcinogenicity of Tetrachlorvinphos, Parathion, Malathion, Diazinon & Glyphosate, supra at 77.

of aromatic amino acids, which leads to several metabolic disturbances, including the inhibition of protein and secondary product biosynthesis and general metabolic disruption.

423. The IARC Working Group also reviewed an Agricultural Health Study, consisting of a prospective cohort of 57,311 licensed pesticide applicators in Iowa and North Carolina. While this study differed from others in that it was based on a self-administered questionnaire, the results support an association between glyphosate exposure and multiple myeloma, hairy cell leukemia (HCL), and chronic lymphocytic leukemia (CLL), in addition to several other cancers.

Other Earlier Findings About Glyphosate's Dangers to Human Health

424. The EPA has a technical fact sheet, as part of its Drinking Water and Health, National Primary Drinking Water Regulations publication, relating to glyphosate. This technical fact sheet predates IARC's March 20, 2015 evaluation. The fact sheet describes the release patterns for glyphosate as follows:

Release Patterns

Glyphosate is released to the environment in its use as a herbicide for controlling woody and herbaceous weeds on forestry, right-of-way, cropped and non-cropped sites. These sites may be around water and in wetlands.

It may also be released to the environment during its manufacture, formulation, transport, storage, disposal and cleanup, and from spills. Since glyphosate is not a listed chemical in the Toxics Release Inventory, data on releases during its manufacture and handling are not available.

Occupational workers and home gardeners may be exposed to glyphosate by inhalation and dermal contact during spraying, mixing, and cleanup. They may also be exposed by touching soil

²² Anneclare J. De Roos et al., *Cancer Incidence Among Glyphosate-Exposed Pesticide Applicators in the Agricultural Health Study*, 113 Envt'l Health Perspectives 49–54 (2005), *available at* http://www.ncbi.nlm.nih.gov/pmc/articles/PMC1253709/pdf/ehp0113-000049.pdf.

and plants to which glyphosate was applied. Occupational exposure may also occur during glyphosate's manufacture, transport storage, and disposal.²³

425. In 1995, the Northwest Coalition for Alternatives to Pesticides reported that in California, the state with the most comprehensive program for reporting of pesticide-caused illness, glyphosate was the third most commonly-reported cause of pesticide illness among agricultural workers.²⁴

The Toxicity of Other Ingredients in Roundup®

- 426. In addition to the toxicity of the active ingredient, glyphosate, several studies support the hypothesis that the glyphosate-based formulation in Defendant's Roundup[®] products is more dangerous and toxic than glyphosate alone. Indeed, as early as 1991, available evidence demonstrated that glyphosate formulations were significantly more toxic than glyphosate alone.²⁵
- 427. In 2002, a study by Julie Marc, entitled "Pesticide Roundup Provokes Cell Division Dysfunction at the Level of CDK1/Cyclin B Activation," revealed that Roundup[®] causes delays in the cell cycles of sea urchins but that the same concentrations of glyphosate alone were ineffective and did not alter cell cycles.²⁶

²³ U.S. Envtl. Prot. Agency, *Technical Factsheet on: Glyphosate*, supra.

²⁴ Caroline Cox, *Glyphosate*, *Part 2: Human Exposure and Ecological Effects*, 15 J. PESTICIDE REFORM 4 (1995); W.S. Peas et al., *Preventing pesticide-related illness in California agriculture: Strategies and priorities. Environmental Health Policy Program Report*, Univ. of Cal. School of Public Health, Calif. Policy Seminar (1993).

²⁵ Martinez, T.T. and K. Brown, *Oral and pulmonary toxicology of the surfactant used in Roundup herbicide*, PROC. WEST. PHARMACOL. SOC. 34:43-46 (1991).

²⁶ Julie Marc, et al., *Pesticide Roundup Provokes Cell Division Dysfunction at the Level of CDK1/Cyclin B Activation*, 15 CHEM. RES. TOXICOL. 326–331 (2002), *available at* http://pubs.acs.org/doi/full/10.1021/tx015543g.

- 428. A 2004 study by Marc and others, entitled "Glyphosate-based pesticides affect cell cycle regulation," demonstrated a molecular link between glyphosate-based products and cell cycle dysregulation. The researchers noted that "cell-cycle dysregulation is a hallmark of tumor cells and human cancer. Failure in the cell-cycle checkpoints leads genomic instability and subsequent development of cancers from the initial affected cell." Further, "[s]ince cell cycle disorders such as cancer result from dysfunction of a unique cell, it was of interest to evaluate the threshold dose of glyphosate affecting the cells."
- A29. In 2005, a study by Francisco Peixoto, entitled "Comparative effects of the Roundup and glyphosate on mitochondrial oxidative phosphorylation," demonstrated that Roundup®'s effects on rat liver mitochondria are far more toxic than equal concentrations of glyphosate alone. The Peixoto study further suggested that the harmful effects of Roundup® on mitochondrial bioenergetics could not be exclusively attributed to glyphosate but could be the result of other chemicals, such as the surfactant POEA, or in the alternative, due to a potential synergic effect between glyphosate and other ingredients in the Roundup® formulation.²⁸
- 430. In 2009, Nora Benachour and Gilles-Eric Seralini published a study examining the effects of Roundup[®] and glyphosate on human umbilical, embryonic, and placental cells. The study tested dilution levels of Roundup[®] and glyphosate that were far below agricultural recommendations, corresponding with low levels of residue in food. The researchers ultimately concluded that supposed "inert" ingredients, and possibly POEA, alter human cell permeability

²⁷ Julie Marc, et al., *Glyphosate-based pesticides affect cell cycle regulation*, 96 BIOLOGY OF THE CELL 245, 245-249 (2004), *available at* http://onlinelibrary.wiley.com/doi/10.1016/j.biolcel.2003.11.010/epdf.

²⁸ Francisco Peixoto, *Comparative effects of the Roundup and glyphosate on mitochondrial oxidative phosphorylation*, 61 CHEMOSPHERE 1115, 1122 (2005), *available at* https://www.researchgate.net/publication/7504567_Comparative_effects_of_the_Roundup_and_glyphosate_on_mitochondrial_oxidative_phosphorylation.

and amplify toxicity of glyphosate alone. The researchers further suggested that assessments of glyphosate toxicity should account for the presence of adjuvants or additional chemicals used in the formulation of the complete pesticide. The study confirmed that the adjuvants present in Roundup[®] are not, in fact, inert and that Roundup[®] is potentially far more toxic than its active ingredient glyphosate alone.²⁹

- 431. The results of these studies were at all times available to Defendant. Defendant thus knew or should have known that Roundup[®] is more toxic than glyphosate alone and that safety studies of Roundup[®], Roundup's adjuvants and "inert" ingredients, and/or the surfactant POEA were necessary to protect Plaintiffs from Roundup[®].
- 432. Despite its knowledge that Roundup[®] is considerably more dangerous than glyphosate alone, Defendant continued to promote Roundup[®] as safe.

Recent Worldwide Bans on Roundup®/Glyphosate

and other glyphosate-containing herbicides, both before and since IARC first announced its assessment for glyphosate in March 2015, and more countries undoubtedly will follow suit as the dangers of the use of Roundup[®] become more widely known. The Netherlands issued a ban on all glyphosate-based herbicides in April 2014, including Roundup[®], which will take effect by the end of 2015. In issuing the ban, the Dutch Parliament member who introduced the successful legislation stated: "Agricultural pesticides in user-friendly packaging are sold in abundance to private persons. In garden centers, Roundup[®] is promoted as harmless, but

²⁹ Nora Benachour, et al., *Glyphosate Formulations Induce Apoptosis and Necrosis in Human Umbilical, Embryonic, and Placental Cells*, 22 CHEM. RES. TOXICOL. 97-105 (2008), *available at* http://big.assets.huffingtonpost.com/france.pdf.

unsuspecting customers have no idea what the risks of this product are. Especially children are sensitive to toxic substances and should therefore not be exposed to it."³⁰

- 434. The Brazilian Public Prosecutor in the Federal District requested that the Brazilian Justice Department suspend the use of glyphosate.³¹
- 435. France banned the private sale of Roundup® and glyphosate following the IARC assessment for Glyphosate.³²
- 436. Bermuda banned both the private and commercial sale of glyphosates, including Roundup[®]. The Bermuda government explained its ban as follows: "Following a recent scientific study carried out by a leading cancer agency, the importation of weed spray 'Roundup' has been suspended."³³
- 437. The Sri Lankan government banned the private and commercial use of glyphosate, particularly out of concern that glyphosate has been linked to fatal kidney disease in agricultural workers.³⁴

³⁰ Holland's Parliament Bans Glyphosate Herbicides, The Real Agenda, April 14, 2014, available at http://real-agenda.com/hollands-parliament-bans-glyphosate-herbicides/.

³¹ Christina Sarich, *Brazil's Public Prosecutor Wants to Ban Monsanto's Chemicals Following Recent Glyphosate-Cancer Link*, GLOBAL RESEARCH, May 14, 2015, *available at* http://www.globalresearch.ca/brazils-public-prosecutor-wants-to-ban-monsantos-chemicals-following-recent-glyphosate-cancer-link/5449440; *see* Ministério Público Federal, *MPF/DF reforça pedido para que glifosato seja banido do mercado nacional*, April, 14, 2015, *available at* http://noticias.pgr.mpf.mp.br/noticias/noticias-do-site/copy_of_meio-ambiente-e-patrimonio-cultural/mpf-df-reforca-pedido-para-que-glifosato-seja-banido-do-mercado-nacional.

³² Zoe Schlanger, France Bans Sales of Monsanto's Roundup in Garden Centers, 3 Months After U.N. Calls it 'Probable Carcinogen', NEWSWEEK, June 15, 2015, available at http://www.newsweek.com/france-bans-sale-monsantos-roundup-garden-centers-after-un-names-it-probable-343311.

³³ Health Minister: Importation of Roundup Weed Spray Suspended. Today in Bermuda, May, 11 2015, available at http://www.todayinbermuda.com/news/health/item/1471-health-minister-importation-of-roundup-weed-spray-suspended.

³⁴ *Sri Lanka's New President Puts Immediate Ban on Glyphosate Herbicides*, Sustainable Pulse, May 25, 2015, *available at* http://sustainablepulse.com/2015/05/25/sri-lankas-new-president-puts-immediate-ban-on-glyphosate-herbicides/#.VeduYk3bKAw.

438. The government of Colombia announced its ban on using Roundup[®] and glyphosate to destroy illegal plantations of coca, the raw ingredient for cocaine, because of the WHO's finding that glyphosate is probably carcinogenic.³⁵

Proposition 65 Listing

- Assessment ("OEHHA") published a notice of intent to include glyphosate on the state's list of known carcinogens under Proposition 65.³⁶ California's Safe Drinking Water and Toxic Enforcement Act of 1986 (informally known as "Proposition 65"), requires the state to maintain and, at least once a year, revise and republish a list of chemicals "known to the State of California to cause cancer or reproductive toxicity." The OEHHA determined that glyphosate met the criteria for the listing mechanism under the Labor Code following IARC's assessment of the chemical.³⁸
- 440. The listing process under the Labor Code is essentially automatic. The list of known carcinogens, at a minimum, must include substances identified by reference in Labor Code § 6382(b)(1). That section of the Labor Code identifies "[s]ubstances listed as human or animal carcinogens by the International Agency for Research on Cancer (IARC)." IARC's

³⁵ Columbia to ban coca spraying herbicide glyphosate, BBC, May 10, 2015, available at http://www.bbc.com/news/world-latin-america-32677411.

³⁶ Cal. Envtl. Prot. Agency Office of Envtl. Health Hazard Assessment, Notice of Intent to List Chemicals by the Labor Code Mechanism: Tetrachlorvinphos, Parathion, Malathion, Glyphosate (Sept. 4, 2015),

 $http://oehha.ca.gov/prop65/CRNR_notices/admin_listing/intent_to_list/pdf_zip/090415NOIL_LCSet27. pdf.$

³⁷ Frequently Asked Questions, STATE OF CAL. DEP'T OF JUSTICE, OFFICE OF THE ATTORNEY GENERAL, http://oag.ca.gov/prop65/faq (last visited April 19, 2016).

³⁸ Cal. Envtl. Prot. Agency Office of Envtl. Health Hazard Assessment, Notice of Intent to List Chemicals by the Labor Code Mechanism: Tetrachlorvinphos, Parathion, Malathion, Glyphosate (Sept. 4, 2015),

 $http://oehha.ca.gov/prop65/CRNR_notices/admin_listing/intent_to_list/pdf_zip/090415NOIL_LCSet27. pdf.$

classification of glyphosate as a Group 2A chemical ("probably carcinogenic to humans") therefore triggered the listing.

- 441. A business that deploys a listed chemical in its products must provide "clear and reasonable warnings" to the public prior to exposure to the chemical. To be clear and reasonable, a warning must "(1) clearly communicate that the chemical is known to cause cancer, and/or birth defects or other reproductive harm; and (2) effectively reach the person before exposure." The law also prohibits the discharge of listed chemicals into drinking water.
- 442. Monsanto disputed the listing decision and, in January 2016, filed a lawsuit against OEHHA and the agency's acting director, Lauren Zeise, in California state court, seeking declaratory and injunctive relief to prevent OEHHA from listing glyphosate.⁴⁰
- 443. Monsanto alleged that OEHHA's exclusive reliance on the IARC decision signified that "OEHHA effectively elevated the determination of an ad hoc committee of an unelected, foreign body, which answers to no United States official (let alone any California state official), over the conclusions of its own scientific experts." Monsanto further alleged that the Labor Code listing mechanism presented various constitutional violations because it "effectively empowers an unelected, undemocratic, unaccountable, and foreign body to make laws applicable in California. Among other things, Monsanto argued that Proposition 65's

 $^{^{39}}$ Frequently Asked Questions, State of Cal. Department of Justice, Office of the Attorney General, supra.

⁴⁰ Monsanto Company's Verified Petition for Writ of Mandate and Complaint for Preliminary and Permanent Injunctive and Declaratory Relief, Monsanto Co. v. Office of the Envt'l Health Hazard Assessment, et al., No. 16-CECG-00183 (Cal. Super. Ct.) *available at* http://www.monsanto.com/files/documents/monvoehha.pdf.

⁴¹ *Id*. at 2.

⁴² *Id*. at 3.

requirement to provide a "clear and reasonable warning" to consumers that the chemical is a known carcinogen would damage its reputation and violate its First Amendment rights.⁴³

444. The case remains pending.

EFSA Report on Glyphosate

- 445. On November 12, 2015, the European Food Safety Authority (EFSA), the European Union's primary agency for food safety, reported on its evaluation of the Renewal Assessment Report (RAR) on glyphosate. The Rapporteur Member State assigned to glyphosate, the German Federal Institute for Risk Assessment (BfR), had produced the RAR as part of the renewal process for glyphosate in the EU.
- 446. BfR sent its draft RAR to EFSA and the RAR underwent a peer review process by EFSA, other member states, and industry groups. As part of the on-going peer review of Germany's reevaluation of glyphosate, EFSA had also received a second mandate from the European Commission to consider IARC's findings regarding the potential carcinogenicity of glyphosate and glyphosate-containing products.
- 447. Based on a review of the RAR, which included data from industry-submitted unpublished studies, EFSA sent its own report ("Conclusion") to the European Commission, finding that "glyphosate is unlikely to pose a carcinogenic hazard to humans and the evidence does not support classification with regard to its carcinogenic potential according to Regulation (EC) No 1272/2008." EFSA therefore disagreed with IARC: glyphosate was not genotoxic and did not present a carcinogenic threat to humans.

⁴³ *Id*.

⁴⁴ European Food Safety Auth., Conclusion on the peer review of the pesticide risk assessment of the active substance glyphosate, *available at* http://www.efsa.europa.eu/sites/default/files/scientific_output/files/main_documents/4302.pdf.

⁴⁵ *Id*.

448. In explaining why its results departed from IARC's conclusion, EFSA drew a distinction between the EU and IARC approaches to the study and classification of chemicals. 46 Although IARC examined "both glyphosate—an active substance—and glyphosate-based formulations, grouping all formulations regardless of their composition," EFSA explained that it considered only glyphosate and that its assessment focuses on "each individual chemical, and each marketed mixture separately." IARC, on the other hand, "assesses generic agents, including groups of related chemicals, as well as occupational or environmental exposure, and cultural or behavioural practices." EFSA accorded greater weight to studies conducted with glyphosate alone than studies of formulated products. 49

449. EFSA went further and noted:

[A]lthough some studies suggest that certain glyphosate-based formulations may be genotoxic (i.e. damaging to DNA), others that look solely at the active substance glyphosate do not show this effect. It is likely, therefore, that the genotoxic effects observed in some glyphosate-based formulations are related to the other constituents or "co-formulants". Similarly, certain glyphosate-based formulations display higher toxicity than that of the active ingredient, presumably because of the presence of co-formulants. In its assessment, EFSA proposes that the toxicity of each pesticide formulation and in particular its genotoxic potential should be further considered and addressed by Member State authorities while they re-assess uses of glyphosate-based formulations in their own territories.⁵⁰

450. Notwithstanding its conclusion, EFSA did set exposure levels for glyphosate.

Specifically, EFSA proposed an acceptable daily intake (ADI) of 0.5 mg/kg of body weight per

⁴⁶ EFSA Fact Sheet: Glyphosate, EFSA http://www.efsa.europa.eu/sites/default/files/corporate_publications/files/efsaexplainsglyphosate151112 en.pdf.

⁴⁷ *Id*.

⁴⁸ *Id*.

⁴⁹ *Id*.

⁵⁰ *Id*.

day; an acute reference dose (ARfD) of 0.5 mg/kg of body weight; and an acceptable operator exposure level (AOEL) of 0.1 mg/kg bw per day.⁵¹

Leading Scientists Dispute EFSA's Conclusion

- 451. On November 27, 2015, 96 independent academic and governmental scientists from around the world submitted an open letter to the EU health commissioner, Vytenis Andriukaitis.⁵² The scientists expressed their strong concerns and urged the commissioner to disregard the "flawed" EFSA report, arguing that "the BfR decision is not credible because it is not supported by the evidence and it was not reached in an open and transparent manner."⁵³
- 452. Signatories to the letter included Dr. Christopher J. Portier, Ph.D., and other renowned international experts in the field, some of whom were part of the IARC Working Group assigned to glyphosate.
- 453. In an exhaustive and careful examination, the scientists scrutinized EFSA's conclusions and outlined why the IARC Working Group decision was "by far the more credible":

The IARC WG decision was reached relying on open and transparent procedures by independent scientists who completed thorough conflict-of-interest statements and were not affiliated or financially supported in any way by the chemical manufacturing industry. It is fully referenced and depends entirely on reports published in the open, peer-reviewed biomedical literature. It is part of a long tradition of deeply researched and highly credible reports on the carcinogenicity of hundreds of chemicals issued over the past four decades by IARC and used today by

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⁵¹ European Food Safety Auth., Conclusion on the peer review of the pesticide risk assessment of the active substance glyphosate, *supra*.

⁵² Letter from Christopher J. Portier et al. to Commission Vytenis Andriukaitis, Open letter: Review of the Carcinogenicity of Glyphosate by EFSA and BfR (Nov. 27, 2015), http://www.zeit.de/wissen/umwelt/2015-11/glyphosat-offener-brief.pdf; http://www.theguardian.com/environment/2016/jan/13/eu-scientists-in-row-over-safety-of-glyphosate-weedkiller.

⁵³ *Id*.

- international agencies and regulatory bodies around the world as a basis for risk assessment, regulation and public health policy. ⁵⁴
- 454. With respect to human data, the scientists pointed out that EFSA agreed with IARC that there was "*limited evidence* of carcinogenicity" for NHL, but EFSA nonetheless dismissed an association between glyphosate exposure and carcinogenicity. IARC applies three levels of evidence in its analyses of human data, including sufficient evidence and limited evidence. EFSA's ultimate conclusion that "there was no unequivocal evidence for a clear and strong association of NHL with glyphosate" was misleading because it was tantamount to IARC's highest level of evidence: "sufficient evidence," which means that a causal relationship has been established. However, the scientists argued, "[I]egitimate public health concerns arise when 'causality is credible,' i.e., when there is *limited evidence*." ⁵⁵
- 455. Among its many other deficiencies, EFSA's conclusions regarding animal carcinogenicity data were "scientifically unacceptable," particularly in BfR's use of historical control data and in its trend analysis. Indeed, BfR's analysis directly contradicted the Organisation for Economic Co-operation and Development ("OECD") testing guidelines while citing and purporting to follow those same guidelines. For instance, the EFSA report dismisses observed trends in tumor incidence "because there are no individual treatment groups that are significantly different from controls and because the maximum observed response is reportedly within the range of the historical control data." However, according to the scientists, concurrent controls are recommended over historical controls in all guidelines, scientific reports, and publications, and, if it is employed, historical control data "should be from studies in the same timeframe, for the same exact animal strain, preferably from the same laboratory or

⁵⁴ *Id*.

⁵⁵ *Id*.

the same supplier and preferably reviewed by the same pathologist." BfR's use of historical control data violated these precautions: "only a single study used the same mouse strain as the historical controls, but was reported more than 10 years after the historical control dataset was developed." Further deviating from sound scientific practices, the data used by the BfR came from studies in seven different laboratories. The scientists concluded:

BfR reported seven positive mouse studies with three studies showing increases in renal tumors, two with positive findings for hemangiosarcomas, and two with positive findings for malignant lymphomas. BfR additionally reported two positive findings for tumors in rats. Eliminating the inappropriate use of historical data, the unequivocal conclusion is that these are not negative studies, but in fact document the carcinogenicity of glyphosate in laboratory animals. ⁵⁶

456. The letter also critiqued the EFSA report's lack of transparency and the opacity surrounding the data cited in the report: "citations for almost all of the references, even those from the open scientific literature, have been redacted from the document" and "there are no authors or contributors listed for either document, a requirement for publication in virtually all scientific journals." Because BfR relied on unpublished, confidential industry-provided studies, it is "impossible for any scientist not associated with BfR to review this conclusion with scientific confidence." ⁵⁷

457. On March 3, 2016, the letter was published in the Journal of Epidemiology & Community Health.⁵⁸

⁵⁷ *Id*.

⁵⁶ *Id*.

⁵⁸ Christopher J. Portier, et al., *Differences in the carcinogenic evaluation of glyphosate between the International Agency for Research on Cancer (IARC) and the European Food Safety Authority (EFSA)*, JOURNAL OF EPIDEMIOLOGY & CMTY. HEALTH, Mar. 3, 2016, *available at* http://jech.bmj.com/content/early/2016/03/03/jech-2015-207005.full.

Statement of Concern Regarding Glyphosate-Based Herbicides

458. On February 17, 2016, a consensus statement published in the journal *Environmental Health*, entitled "Concerns over use of glyphosate-based herbicides and risks associated with exposures: a consensus statement," assessed the safety of glyphosate-based herbicides (GBHs).⁵⁹ The paper's "focus is on the unanticipated effects arising from the worldwide increase in use of GBHs, coupled with recent discoveries about the toxicity and human health risks stemming from use of GBHs." The researchers drew seven factual conclusions about GBHs:

- 1. GBHs are the most heavily applied herbicide in the world and usage continues to rise;
- 2. Worldwide, GBHs often contaminate drinking water sources, precipitation, and air, especially in agricultural regions;
- 3. The half-life of glyphosate in water and soil is longer than previously recognized;
- 4. Glyphosate and its metabolites are widely present in the global soybean supply;
- 5. Human exposures to GBHs are rising;
- 6. Glyphosate is now authoritatively classified as a probable human carcinogen; and
- 7. Regulatory estimates of tolerable daily intakes for glyphosate in the United States and European Union are based on outdated science. ⁶¹

⁵⁹ John P. Myers, et al, *Concerns over use of glyphosate-based herbicides and risks associated with exposures: a consensus statement*, Environmental Health (2016), *available at* http://ehjournal.biomedcentral.com/articles/10.1186/s12940-016-0117-0.

⁶⁰ *Id*.

⁶¹ *Id*.

- 459. The researchers noted that GBH use has increased approximately 100-fold since the 1970s. Further, far from posing a limited hazard to vertebrates, as previously believed, two decades of evidence demonstrated that "several vertebrate pathways are likely targets of action, including hepatorenal damage, effects on nutrient balance through glyphosate chelating action and endocrine disruption."
- 460. The paper attributes uncertainties in current assessments of glyphosate formulations to the fact that "[t]he full list of chemicals in most commercial GBHs is protected as 'commercial business information,' despite the universally accepted relevance of such information to scientists hoping to conduct an accurate risk assessment of these herbicide formulations." Further, the researchers argue, "[t]he distinction in regulatory review and decision processes between 'active' and 'inert' ingredients has no toxicological justification, given increasing evidence that several so-called 'inert' adjuvants are toxic in their own right."
- 461. Among various implications, the researchers conclude that "existing toxicological data and risk assessments are not sufficient to infer that GBHs, as currently used, are safe." Further, "GBH-product formulations are more potent, or toxic, than glyphosate alone to a wide array of non-target organisms including mammals, aquatic insects, and fish." Accordingly, "risk assessments of GBHs that are based on studies quantifying the impacts of glyphosate alone underestimate both toxicity and exposure, and thus risk." The paper concludes that this "shortcoming has repeatedly led regulators to set inappropriately high exposure thresholds."

⁶² *Id*.

⁶³ *Id*.

⁶⁴ *Id*.

- 462. The researchers also critique the current practice of regulators who largely rely on "unpublished, non-peer reviewed data generated by the registrants" but ignore "published research because it often uses standards and procedures to assess quality that are different from those codified in regulatory agency data requirements, which largely focus on avoiding fraud." In the researchers' view, "[s]cientists independent of the registrants should conduct regulatory tests of GBHs that include glyphosate alone, as well as GBH-product formulations."
- 463. The researchers also call for greater inclusion of GBHs in government-led toxicology testing programs:

[A] fresh and independent examination of GBH toxicity should be undertaken, and . . . this re-examination be accompanied by systematic efforts by relevant agencies to monitor GBH levels in people and in the food supply, none of which are occurring today. The U.S. National Toxicology Program should prioritize a thorough toxicological assessment of the multiple pathways now identified as potentially vulnerable to GBHs. 66

464. The researchers suggest that, in order to fill the gap created by an absence of government funds to support research on GBHs, regulators could adopt a system through which manufacturers fund the registration process and the necessary testing:

"[W]e recommend that a system be put in place through which manufacturers of GBHs provide funds to the appropriate regulatory body as part of routine registration actions and fees. Such funds should then be transferred to appropriate government research institutes, or to an agency experienced in the award of competitive grants. In either case, funds would be made available to independent scientists to conduct the appropriate long-term (minimum 2 years) safety studies in recognized animal model systems. A thorough and modern assessment of GBH toxicity will encompass potential endocrine disruption, impacts on the gut microbiome, carcinogenicity, and multigenerational effects looking at reproductive capability and frequency of birth defects."

⁶⁵ *Id*.

⁶⁶ *Id*.

⁶⁷ *Id*.

FDA Announces Testing of Glyphosate Residue in Foods

- 465. On February 17, 2016, the U.S. Food and Drug Administration ("FDA") announced that, for the first time in its history, the agency planned to start testing certain foods for glyphosate residues. FDA spokeswoman Lauren Sucher explained: "The agency is now considering assignments for Fiscal Year 2016 to measure glyphosate in soybeans, corn, milk, and eggs, among other potential foods."
- 466. In 2014, the U.S. Government Accountability Office (GAO) had severely rebuked the FDA for its failures to both monitor for pesticide residue, including that of glyphosate, and to disclose the limitations of its monitoring and testing efforts to the public.⁶⁹ The GAO had cited numerous undisclosed deficiencies in the FDA's process, specifically highlighting its omission of glyphosate testing.
- 467. Indeed, in the past, both the FDA and the U.S. Department of Agriculture (USDA) had routinely excluded glyphosate from their testing for the residues of hundreds of other pesticides, on the rationale that it was too expensive and unnecessary to protect public health. Ms. Sucher, the FDA spokeswoman, however, now states that "the agency has developed 'streamlined methods' for testing for the weed killer."
- 468. The FDA's move is significant as the agency possesses enforcement authority and can seek action if pesticide residues exceed enforcement guidelines.⁷¹

⁶⁸ Carey Gillam, *FDA to Start Testing for Glyphosate in Food*, TIME, Feb. 17, 2016, *available at* http://time.com/4227500/fda-glyphosate-testing/?xid=tcoshare.

⁶⁹ U.S. GOV'T ACCOUNTABILITY OFFICE, GAO-15-38, FDA AND USDA SHOULD STRENGTHEN PESTICIDE RESIDUE MONITORING PROGRAMS AND FURTHER DISCLOSE MONITORING LIMITATIONS (2014), available at http://www.gao.gov/products/GAO-15-38.

⁷⁰ Gillam, *supra* note 46.

⁷¹ *Id.*; Pesticide Q&A, U.S. FOOD AND DRUG ADMINISTRATION, http://www.fda.gov/Food/FoodborneIllnessContaminants/Pesticides/ucm114958.htm (last visited April 19, 2016).

European Union Vote on Glyphosate Renewal

- 469. The license for glyphosate in the European Union (EU) was set to expire on June 30, 2016.
- 470. Without an extension of the license, Monsanto's Roundup[®] and other glyphosate-based herbicides faced a general phase out in EU markets.⁷²
- 471. In the months leading up to the license expiration date, protracted meetings and votes among national experts from the 28 EU Member States failed to produce agreement on an extension.
- A72. For instance, on March 4, 2016, *The Guardian* reported that France, the Netherlands, and Sweden did not support EFSA's assessment that glyphosate was harmless.⁷³ The paper quoted the Swedish environment minister, Åsa Romson, as stating: "We won't take risks with glyphosate and we don't think that the analysis done so far is good enough. We will propose that no decision is taken until further analysis has been done and the Efsa scientists have been more transparent about their considerations."
- 473. The Netherlands argued that relicensing should be placed on hold until after a separate evaluation of glyphosate's toxicity can be conducted.⁷⁵ Leading up to the vote, Italy joined the other EU states in opposing the license renewal, citing health concerns.⁷⁶

⁷² Philip Blenkinsop, Alissa de Carbonnel & Barbara Lewis European, *Commission to extend glyphosate license for 18 months*, REUTERS, June 28, 2016, *available at* http://www.reuters.com/article/us-health-eu-glyphosate-idUSKCN0ZE25B.

⁷³ Arthur Neslen, *EU states rebel against plans to relicense weedkiller glyphosate*, THE GUARDIAN, Mar. 4, 2016, *available at* http://www.theguardian.com/environment/2016/mar/04/eustates-rebel-against-plans-to-relicense-weedkiller-glyphosate.

^{&#}x27;4 *Id*.

⁷⁵ Arthur Neslen, *Vote on Controversial weedkiller's European licence postponed*, THE GUARDIAN, Mar. 8, 2016, *available at* http://www.theguardian.com/environment/2016/mar/08/eu-vote-on-controversial-weedkiller-licence-postponed-glyphosate.

⁷⁶ *Id*.

- 474. On June 6, 2016, Member States voted but failed to reach a qualified majority in favor or against the re-authorization of glyphosate.⁷⁷
- 475. On June 29, 2016, the EU Commission extended the European license for glyphosate for 18 months to allow the European Chemical Agency to rule on the safety of the chemical, which is expected by the end of 2017.⁷⁸
- 476. On July 11, 2016, the EU voted in favor of a proposal to restrict the conditions of use of glyphosate in the EU, including a ban on common co-formulant POE-tallowamine (POEA) from all glyphosate-based herbicides, including Roundup[®]. ⁷⁹
- 477. These restrictions, which are non-binding on the EU states, are expected to apply until the European Chemicals Agency issues an opinion on the chemical's safety.⁸⁰

TOLLING OF THE STATUTE OF LIMITATIONS

Discovery Rule Tolling

- 478. Plaintiffs incorporate by reference all preceding paragraphs as if fully set forth herein.
- 479. Plaintiffs have suffered an illness that has a latency period and does not arise until years after exposure. Plaintiff had no way of knowing about the risk of serious illness associated

⁷⁷ Manon Flausch, *Commission prolongs glyphosate license by 18 months*, EURACTIV, June 29, 2016, *available at* http://www.euractiv.com/section/agriculture-food/news/commission-prolongs-glyphosate-licence-by-18-months/

⁷⁸ Arthur Neslen, *Controversial chemical in Roundup weedkiller escapes immediate ban*, THE GUARDIAN, June 29, 2016, *available at* https://www.theguardian.com/business/2016/jun/29/controversial-chemical-roundup-weedkiller-escapes-immediate-ban

⁷⁹ Sarantis Michalopoulos, *EU agrees ban on glyphosate co-formulant*, EURACTIV, July 11, 2016, *available at* http://www.euractiv.com/section/agriculture-food/news/eu-agrees-ban-on-glyphosate-co-formulant/?nl ref=16562829

⁸⁰ See Arthur Neslen, Controversial chemical in Roundup weedkiller escapes immediate ban, The Guardian, June 29, 2016.

with the use of and/or exposure to Roundup[®] and glyphosate until they were made aware that their NHL could be caused by their use and/or exposure to Roundup[®]. Consequently, the discovery rule applies to these cases, and the statute of limitations has been tolled until the day that Plaintiffs knew or had reason to know that their NHL was linked to their use of and/or exposure to Roundup[®].

- 480. Within the time period of any applicable statutes of limitations, Plaintiffs could not have discovered, through the exercise of reasonable diligence, that exposure to Roundup[®] and glyphosate is injurious to human health.
- 481. Plaintiffs did not discover, and did not know of facts that would cause a reasonable person to suspect, the risks associated with the use of and/or exposure to Roundup[®] and glyphosate; nor would a reasonable and diligent investigation by them have disclosed that Roundup[®] and glyphosate would cause their NHL.
- 482. Furthermore, the running of the statute of limitations has been equitably tolled by reason of Defendant's fraudulent concealment and conduct. Through its affirmative misrepresentations and omissions, Defendant actively concealed from Plaintiffs the true risks associated with use of or exposure to Roundup[®].
- 483. As a result of Defendant's actions, Plaintiffs were unaware, and could not reasonably know or have learned through reasonable diligence, that Plaintiffs had been exposed to the risks alleged herein and that those risks were the direct and proximate result of Defendant's acts and omissions.
- 484. Furthermore, Defendant is estopped from relying on any statute of limitations because of its concealment of the truth regarding the safety of Roundup[®]. Defendant was under a duty to disclose the true character, quality and nature of Roundup[®] because this was non-public

information over which it continues to have exclusive control. Defendant knew that this information was not available to Plaintiffs, their medical providers and/or their health facilities, yet it failed to disclose the information to the public.

- 485. Defendant had the ability to and did spend enormous amounts of money in furtherance of their purposes of marketing and promoting a profitable product, notwithstanding the known or reasonably knowable risks. Plaintiffs and medical professionals could not have afforded to and could not have possibly conducted studies to determine the nature, extent and identity of related health risks, and they were forced to rely on Defendant's representations.
- 486. For these reasons, all applicable statutes of limitations have been tolled by operation of the discovery rule with respect to Plaintiffs' claims.

Estoppel

- 487. Monsanto was under a continuous duty to disclose to consumers, users and other persons coming into contact with its products, including Plaintiffs, accurate safety information concerning its products and the risks associated with the use of and/or exposure to Roundup[®] and glyphosate.
- 488. Instead, Monsanto knowingly, affirmatively, and actively concealed safety information concerning Roundup[®] and glyphosate and the serious risks associated with the use of and/or exposure to its products.
- 489. Based on the foregoing, Monsanto is estopped from relying on any statutes of limitations in defense of this action.

COUNT ONE: STRICT LIABILITY FOR DEFECTIVE MANUFACUTRE AND DESIGN

490. Plaintiffs incorporate by reference each and every allegation set forth in the preceding paragraphs as if fully stated herein.

- 491. Plaintiffs bring this strict liability claim against Defendant for defective manufacture and design.
- 492. At all relevant times, Defendant engaged in the business of testing, developing, designing, manufacturing, marketing, selling, distributing, and promoting Roundup[®] products, which are defective and unreasonably dangerous to consumers, users, and other persons coming into contact with them, including Plaintiffs, thereby placing Roundup[®] products into the stream of commerce. These actions were under the ultimate control and supervision of Defendant.
- 493. At all times relevant to this litigation, Defendant designed, researched, developed, formulated, manufactured, produced, tested, assembled, labeled, advertised, promoted, marketed, sold, and distributed the Roundup[®] products used by the Plaintiffs, and/or to which the Plaintiffs were exposed, as described above.
- 494. At all times relevant to this litigation, Defendant's Roundup[®] products were manufactured, designed, and labeled in an unsafe, defective, and inherently dangerous manner that was dangerous for use by or exposure to the public, and, in particular, the Plaintiffs.
- 495. At all times relevant to this litigation, Defendant's Roundup[®] products reached the intended consumers, handlers, and users or other persons coming into contact with these products in Missouri and throughout the United States, including Plaintiffs, without substantial change in their condition as designed, manufactured, sold, distributed, labeled, and marketed by Defendant.
- 496. Defendant's Roundup[®] products, as researched, tested, developed, designed, licensed, formulated, manufactured, packaged, labeled, distributed, sold, and marketed by Defendant, were defectively manufactured and designed by Defendant in that when they left the hands of the Defendant's manufacturers and/or suppliers, they were unreasonably dangerous

because they were not as safe as an ordinary consumer would expect when used in an intended or reasonably foreseeable manner.

- 497. Defendant's Roundup[®] products, as researched, tested, developed, designed, licensed, formulated, manufactured, packaged, labeled, distributed, sold, and marketed by Defendant, were defective in manufacture, design and formulation in that when they left the hands of Defendant's manufacturers and/or suppliers, the foreseeable risks associated with these products' reasonably foreseeable uses exceeded the alleged benefits associated with their design and formulation.
- 498. At all relevant times, Defendant's Roundup[®] products created significant risks to the health and safety of consumers and others who were exposed to the products that far outweigh the risks posed by other products on the market used for the same or similar purpose.
- 499. Therefore, at all relevant times to this litigation, Defendant's Roundup[®] products, as researched, tested, developed, designed, licensed, manufactured, packaged, labeled, distributed, sold and marketed by Defendant, were defective in design and formulation, in one or more of the following ways:
 - a. When placed in the stream of commerce, Defendant's Roundup® products were defective in design and formulation, and, consequently, dangerous to an extent beyond that which an ordinary consumer would expect.
 - b. When placed in the stream of commerce, Defendant's Roundup[®] products were unreasonably dangerous in that they were hazardous and posed a grave risk of cancer and other serious illnesses when used in a reasonably anticipated manner.

- c. When placed in the stream of commerce, Defendant's Roundup[®] products contained unreasonably dangerous design defects and were not reasonably safe when used in a reasonably anticipated or intended manner.
- d. Defendant did not sufficiently test, investigate, or study its Roundup® products and, specifically, the active ingredient glyphosate.
- e. Exposure to Roundup[®] and glyphosate-containing products presents a risk of harmful side effects that outweighs any potential utility stemming from the use of the herbicide.
- f. Defendant knew or should have known at the time of marketing its Roundup[®] products that exposure to Roundup[®] and specifically, its active ingredient glyphosate, could result in cancer and other severe illnesses and injuries.
- $\label{eq:gamma-def} g. \qquad \text{Defendant did not conduct adequate post-marketing surveillance of}$ its Roundup $^{\circledR}$ products.
- h. Defendant could have employed safer alternative designs and formulations.
- 500. At all times relevant to this litigation, Plaintiffs used and/or were exposed to Defendant's Roundup[®] products in an intended or reasonably foreseeable manner without knowledge of their dangerous characteristics.
- 501. Plaintiffs could not have reasonably discovered the defects and risks associated with Roundup® or glyphosate-containing products before or at the time of exposure.
- 502. The harm caused by Defendant's Roundup[®] products far outweighed their benefit, rendering Defendant's products dangerous to an extent beyond that which an ordinary consumer

would contemplate. Defendant's Roundup® products were and are more dangerous than alternative products and Defendant could have designed its Roundup® products to make them less dangerous. Indeed, at the time that Defendant designed its Roundup® products, the state of the industry's scientific knowledge was such that a less risky design or formulation was attainable.

- 503. Defendant's defective design of Roundup[®] amounts to willful, wanton, and/or reckless conduct by Defendant.
- 504. As a direct and proximate result of the defective design and manufacture of Roundup[®] products, Plaintiffs developed NHL and have been injured catastrophically and have been caused severe and permanent pain, suffering, disability, impairment, loss of enjoyment of life, loss of care, comfort and economic damages.
- 505. Therefore, as a result of the unreasonably dangerous condition of its Roundup[®] products, Defendant is strictly liable to Plaintiffs.
- 506. The defects in Defendant's Roundup[®] products were substantial and contributing factors in causing Plaintiffs' grave injuries, and, but for Defendant's misconduct and omissions, Plaintiffs would not have sustained their injuries.
- 507. As a direct and proximate result of Defendant placing its defective Roundup[®] products into the stream of commerce, Plaintiffs have suffered and continue to suffer grave injuries, and they have endured pain and discomfort, as well as economic hardship, including considerable financial expenses for medical care and treatment. Plaintiffs will continue to incur these expenses in the future.

508. WHEREFORE, Plaintiffs pray for judgment against Defendant Monsanto in a fair and reasonable sum in excess of \$10,000,000, together with costs expended herein and such further and other relief as the Court deems just and appropriate.

COUNT TWO: STRICT LIABILITY FOR FAILURE TO WARN

- 509. Plaintiffs incorporate by reference every other paragraph of this Complaint as if each were set forth fully and completely herein.
 - 510. Plaintiffs bring this strict liability claim against Defendant for failure to warn.
- 511. At all relevant times, Defendant engaged in the business of testing, developing, designing, manufacturing, marketing, selling, distributing, and promoting Roundup[®] products, which are defective and unreasonably dangerous to consumers, including Plaintiffs, because they do not contain adequate warnings or instructions concerning the dangerous characteristics of Roundup[®] and specifically, the active ingredient glyphosate. These actions were under the ultimate control and supervision of Defendant.
- 512. Defendant researched, developed, designed, tested, manufactured, inspected, labeled, distributed, marketed, promoted, sold, and otherwise released into the stream of commerce its Roundup[®] products, and in the course of same, directly advertised or marketed the products to consumers and end users, including Plaintiffs, Plaintiffs' employers, Plaintiffs' coworkers, and persons responsible for consumers (such as employers), and Defendant therefore had a duty to warn of the risks associated with the reasonably foreseeable uses (and misuses) of Roundup[®] and glyphosate-containing products and a duty to instruct on the proper, safe use of these products.
- 513. At all times relevant to this litigation, Defendant had a duty to properly test, develop, design, manufacture, inspect, package, label, market, promote, sell, distribute, maintain

supply, provide proper warnings, and take such steps as necessary to ensure that its Roundup[®] products did not cause users and consumers to suffer from unreasonable and dangerous risks.

Defendant had a continuing duty to warn Plaintiffs of the dangers associated with Roundup[®] use and exposure, and a continuing duty to instruct on the proper, safe use of these products.

Defendant, as manufacturer, seller, or distributor of chemical herbicides, is held to the knowledge of an expert in the field.

- 514. At the time of manufacture, Defendant could have provided warnings or instructions regarding the full and complete risks of Roundup[®] and glyphosate-containing products because it knew or should have known of the unreasonable risks of harm associated with the use of and/or exposure to these products.
- 515. At all times relevant to this litigation, Defendant failed to investigate, study, test, or promote the safety of its Roundup[®] products. Defendant also failed to minimize the dangers to users and consumers of its Roundup[®] products and to those who would foreseeably use or be harmed by Defendant's herbicides, including Plaintiffs.
- 516. Despite the fact that Defendant knew or should have known that Roundup[®] products posed a grave risk of harm, it failed to warn of the dangerous risks associated with their use and exposure. The dangerous propensities of its products and the carcinogenic characteristics of glyphosate, as described above, were known to Defendant, or scientifically knowable to Defendant through appropriate research and testing by known methods, at the time it distributed, supplied, or sold the product, and not known to end users and consumers, such as Plaintiffs and Plaintiffs' employers.
- 517. Defendant knew or should have known that its Roundup[®] and glyphosate-containing products created significant risks of serious bodily harm to consumers, as alleged

herein, and Defendant failed to adequately warn consumers and reasonably foreseeable users of the risks of exposure to these products. Defendant has wrongfully concealed information concerning the dangerous nature of Roundup[®] and its active ingredient glyphosate, and further made false and/or misleading statements concerning the safety of Roundup[®] and glyphosate.

- 518. At all times relevant to this litigation, Defendant's Roundup[®] products reached the intended consumers, handlers, and users or other persons coming into contact with these products throughout the United States, including Plaintiffs, without substantial change in their condition as designed, manufactured, sold, distributed, labeled, and marketed by Defendant.
- 519. At all times relevant to this litigation, Plaintiffs used and/or were exposed to the use of Defendant's Roundup[®] products in their intended or reasonably foreseeable manner without knowledge of their dangerous characteristics.
- 520. Plaintiffs could not have reasonably discovered the defects and risks associated with Roundup[®] or glyphosate-containing products before or at the time of Plaintiffs' exposure. Plaintiffs relied upon the skill, superior knowledge, and judgment of Defendant.
- 521. Defendant knew or should have known that the minimal warnings disseminated with its Roundup[®] products were inadequate, but it failed to communicate adequate information on the dangers and safe use/exposure and failed to communicate warnings and instructions that were appropriate and adequate to render the products safe for their ordinary, intended, and reasonably foreseeable uses, including agricultural and horticultural applications.
- 522. The information that Defendant did provide or communicate failed to contain relevant warnings, hazards, and precautions that would have enabled agricultural workers, horticultural workers and/or at-home users such as Plaintiffs to utilize the products safely and with adequate protection. Instead, Defendant disseminated information that was inaccurate,

false, and misleading and which failed to communicate accurately or adequately the comparative severity, duration, and extent of the risk of injuries associated with use of and/or exposure to Roundup[®] and glyphosate; continued to aggressively promote the efficacy of its products, even after it knew or should have known of the unreasonable risks from use or exposure; and concealed, downplayed, or otherwise suppressed, through aggressive marketing and promotion, any information or research about the risks and dangers of exposure to Roundup[®] and glyphosate.

- 523. To this day, Defendant has failed to adequately and accurately warn of the true risks of Plaintiffs' injuries associated with the use of and exposure to Roundup[®] and its active ingredient glyphosate, a probable carcinogen.
- 524. As a result of their inadequate warnings, Defendant's Roundup[®] products were defective and unreasonably dangerous when they left the possession and/or control of Defendant, were distributed by Defendant, and used by Plaintiffs.
- 525. Defendant is liable to Plaintiffs for injuries caused by its failure, as described above, to provide adequate warnings or other clinically relevant information and data regarding the appropriate use of its Roundup[®] products and the risks associated with the use of or exposure to Roundup[®] and glyphosate.
- 526. The defects in Defendant's Roundup® products were substantial and contributing factors in causing Plaintiffs' injuries, and, but for Defendant's misconduct and omissions, Plaintiffs would not have sustained their injuries.
- 527. Had Defendant provided adequate warnings and instructions and properly disclosed and disseminated the risks associated with its Roundup[®] products, Plaintiffs could have

avoided the risk of developing injuries as alleged herein and Plaintiffs and Plaintiffs' employers could have obtained alternative herbicides.

- 528. As a direct and proximate result of Defendant placing its defective Roundup[®] products into the stream of commerce and failing to warn Plaintiffs of the increased risk of NHL associated with the use of and/or exposure to Roundup[®] products as described herein, Plaintiffs have developed NHL and have been injured catastrophically and have been caused severe and permanent pain, suffering, disability, impairment, loss of enjoyment of life, loss of care, comfort and economic damages, including for medical care and treatment. Plaintiffs will continue to incur these expenses in the future.
- 529. WHEREFORE, Plaintiffs pray for judgment against Defendant Monsanto in a fair and reasonable sum in excess of \$10,000,000, together with costs expended herein and such further and other relief as the Court deems just and appropriate.

COUNT THREE: VIOLATION OF MISSOURI MERCHANDIZING PRACTICE ACT, § 407.020 et seq.

- 530. Plaintiffs incorporate by reference all other paragraphs of this Complaint as if fully set forth herein.
- 531. At all relevant times, Defendant knew or should have known of the unreasonably dangerous and carcinogenic nature of the use of and/or exposure to Roundup[®].
- 532. At all relevant times, Defendant, through its labeling, advertisements, public representations and marketing of Roundup[®], intentionally used deception, fraud, false pretenses, false promises, misrepresentations and unfair trade practices in order to mislead consumers that Roundup[®] products are safe for use.
- 533. At all relevant times, Defendant also engaged in the concealment, suppression and/or omission of material facts in connection with the sale and/or advertisement of Roundup[®]

products in trade or commerce. In particular, Defendant failed to disclose to the public that the Roundup[®] is unsafe and poses serious health hazards, particularly NHL. Defendant was aware of the hazardous risks posed by Roundup[®] and yet failed to inform the public of these risks through their advertisements, labeling, or other means available to them. The Defendant's failure to state material facts about Roundup[®] constitutes a violation of V.A.M.S. § 407.020.

- 534. At all relevant times, Plaintiffs were deceived by Defendant's intentional misrepresentations and omissions, including by the orchestrated claims made on or in television commercials, advertising materials, websites, and on product labels and packaging regarding the usage and safety of Roundup[®].
- 535. At all relevant times, Plaintiffs acted in reasonable reliance upon the Defendant's unlawful trade practices, and had the Defendant not engaged in the deceptive conduct described herein, Plaintiffs would not have purchased Roundup[®] and/or would have protected themselves from exposure to Roundup[®].
- 536. As a direct and proximate result of Defendant's unlawful trade practices, Plaintiffs developed NHL and have been injured catastrophically and have been caused severe and permanent pain, suffering, disability, impairment, loss of enjoyment of life, loss of care, comfort and economic damages.
- 537. WHEREFORE, Plaintiffs pray for judgment against Defendant in a fair and reasonable sum in excess of \$10,000.00 together with costs expended herein and such further and other relief as the Court deems just and appropriate.

COUNT FOUR: NEGLIGENCE

538. Plaintiffs incorporate by reference each and every allegation set forth in the preceding paragraphs as if fully stated herein.

- 539. At all relevant times, Defendant breached its duty to Plaintiffs and were otherwise negligent in marketing, designing, manufacturing, producing, supplying, inspecting, testing, selling and/or distributing Roundup[®] products.
- 540. Defendant, directly or indirectly, caused Roundup[®] products to be purchased and/or used by Plaintiffs.
- 541. At all times relevant to this litigation, Defendant had a duty to exercise reasonable care in the design, research, manufacture, marketing, advertisement, supply, promotion, packaging, sale, and distribution of its Roundup[®] products, including the duty to take all reasonable steps necessary to manufacture, promote, and/or sell a product that was not unreasonably dangerous to consumers, users, and other persons coming into contact with the product.
- 542. At all times relevant to this litigation, Defendant had a duty to exercise reasonable care in the marketing, advertisement, and sale of its Roundup[®] products. Defendant's duty of care owed to consumers and the general public included providing accurate, true, and correct information concerning the risks of using Roundup[®] and appropriate, complete, and accurate warnings concerning the potential adverse effects of exposure to Roundup[®] and, in particular, its active ingredient glyphosate.
- 543. At all times relevant to this litigation, Defendant knew or, in the exercise of reasonable care, should have known of the hazards and dangers of Roundup[®] and specifically, the carcinogenic properties of the chemical glyphosate.
- 544. Accordingly, at all times relevant to this litigation, Defendant knew or, in the exercise of reasonable care, should have known that use of or exposure to its Roundup[®] products

could cause Plaintiffs' injuries and thus created a dangerous and unreasonable risk of injury to the users of these products, including Plaintiffs.

- 545. Defendant knew or, in the exercise of reasonable care, should have known that Roundup[®] is more toxic than glyphosate alone and that safety studies on Roundup[®], Roundup[®]'s adjuvants and "inert" ingredients, and/or the surfactant POEA were necessary to protect Plaintiffs from Roundup[®].
- 546. Defendant knew or, in the exercise of reasonable care, should have known that tests limited to Roundup[®]'s active ingredient glyphosate were insufficient to prove the safety of Roundup[®].
- 547. Defendant also knew or, in the exercise of reasonable care, should have known that users and consumers of Roundup[®] were unaware of the risks and the magnitude of the risks associated with the use of and/or exposure to Roundup[®] and glyphosate-containing products.
- 548. As such, Defendant breached its duty of reasonable care and failed to exercise ordinary care in the design, research, development, manufacture, testing, marketing, supply, promotion, advertisement, packaging, sale, and distribution of its Roundup® products, in that Defendant manufactured and produced defective herbicides containing the chemical glyphosate, knew or had reason to know of the defects inherent in its products, knew or had reason to know that a user's or consumer's exposure to the products created a significant risk of harm and unreasonably dangerous side effects, and failed to prevent or adequately warn of these risks and injuries.
- 549. Defendant failed to appropriately and adequately test Roundup[®], Roundup[®]'s adjuvants and "inert" ingredients, and/or the surfactant POEA to protect Plaintiffs from Roundup[®].

550. Despite its ability and means to investigate, study, and test its products and to provide adequate warnings, Defendant has failed to do so. Indeed, Defendant has wrongfully concealed information and has further made false and/or misleading statements concerning the safety and/or exposure to Roundup[®] and glyphosate.

551. Defendant's negligence included:

- a. Manufacturing, producing, promoting, formulating, creating, developing, designing, selling, and/or distributing its Roundup® products without thorough and adequate pre- and post-market testing;
- b. Manufacturing, producing, promoting, formulating, creating, developing, designing, selling, and/or distributing Roundup[®] while negligently and/or intentionally concealing and failing to disclose the results of trials, tests, and studies of exposure to glyphosate, and, consequently, the risk of serious harm associated with human use of and exposure to Roundup[®];
- c. Failing to undertake sufficient studies and conduct necessary tests to determine whether or not Roundup[®] products and glyphosate-containing products were safe for their intended use in agriculture, horticulture, and at-home use;
- d. Failing to undertake sufficient studies and conduct necessary tests to determine the safety of "inert" ingredients and/or adjuvants contained within Roundup[®], and the propensity of these ingredients to render Roundup[®] toxic, increase the toxicity of Roundup[®], whether these ingredients are carcinogenic, magnify the carcinogenic properties of Roundup[®], and whether or not "inert" ingredients and/or adjuvants were safe for use;

- e. Failing to use reasonable and prudent care in the design, research, manufacture, formulation, and development of Roundup[®] products so as to avoid the risk of serious harm associated with the prevalent use of Roundup[®]/glyphosate as an herbicide;
- f. Failing to design and manufacture Roundup® products so as to ensure they were at least as safe and effective as other herbicides on the market;
- g. Failing to provide adequate instructions, guidelines, and safety precautions to those persons who Defendant could reasonably foresee would use and/or be exposed to its Roundup[®] products;
- h. Failing to disclose to Plaintiffs, users, consumers, and the general public that the use of and exposure to Roundup[®] presented severe risks of cancer and other grave illnesses;
- i. Failing to warn Plaintiffs, users, consumers, and the general public that the product's risk of harm was unreasonable and that there were safer and effective alternative herbicides available to Plaintiffs and other users or consumers;
- j. Systematically suppressing or downplaying contrary evidence about the risks, incidence, and prevalence of the side effects of Roundup[®] and glyphosate-containing products;
- k. Representing that its Roundup® products were safe for their intended use when, in fact, Defendant knew or should have known that the products were not safe for their intended use;

- l. Declining to make or propose any changes to Roundup[®] products' labeling or other promotional materials that would alert the consumers and the general public of the risks of Roundup[®] and glyphosate;
- m. Advertising, marketing, and recommending the use of Roundup[®] products, while concealing and failing to disclose or warn of the dangers known by Defendant to be associated with or caused by the use of or exposure to Roundup[®] and glyphosate;
- n. Continuing to disseminate information to its consumers, which indicate or imply that Defendant's Roundup[®] products are not unsafe for use in the agricultural, horticultural industries, and/or home use; and
- o. Continuing the manufacture and sale of its products with the knowledge that the products were unreasonably unsafe and dangerous.
- 552. Defendant knew and/or should have known that it was foreseeable that consumers and/or users, such as Plaintiffs, would suffer injuries as a result of Defendant's failure to exercise ordinary care in the manufacturing, marketing, labeling, distribution, and sale of Roundup[®].
- 553. Plaintiffs did not know the nature and extent of the injuries that could result from the intended use of and/or exposure to Roundup[®] or its active ingredient glyphosate.
- 554. As a direct and proximate result of Defendant's negligence, Plaintiffs developed was the proximate cause of the injuries, harm, and economic losses that Plaintiffs suffered, and will continue to suffer, as described herein.
- 555. Defendant's conduct, as described above, was reckless. Defendant regularly risks the lives of consumers and users of its products, including Plaintiffs, with full knowledge of the dangers of its products. Defendant has made conscious decisions not to redesign, re-label, warn,

or inform the unsuspecting public, including Plaintiffs. Defendant's reckless conduct therefore warrants an award of punitive damages.

- 556. As a proximate result of Defendant's wrongful acts and omissions in placing its defective Roundup[®] products into the stream of commerce without adequate warnings of the hazardous and carcinogenic nature of glyphosate, Plaintiffs developed NHL and have been injured catastrophically and have been caused severe and permanent pain, suffering, disability, impairment, loss of enjoyment of life, loss of care, comfort and economic damages, including significant expenses for medical care and treatment, and will continue to incur these expenses in the future.
- 557. WHEREFORE, Plaintiffs pray for judgment against Defendant Monsanto in a fair and reasonable sum in excess of \$10,000,000, together with costs expended herein and such further and other relief as the Court deems just and appropriate.

COUNT FIVE: BREACH OF IMPLIED WARRANTIES

- 558. Plaintiffs incorporate by reference each of the preceding paragraphs as if fully set forth herein.
- 559. At all relevant times, Defendant engaged in the business of testing, developing, designing, formulating, manufacturing, marketing, selling, distributing, and promoting its Roundup[®] products, which are defective and unreasonably dangerous to users, consumers and those in proximity to users, including Plaintiffs, thereby placing Roundup[®] products into the stream of commerce. These actions were under the ultimate control and supervision of Defendant.
- 560. Before the time that Plaintiffs were exposed to the use of the aforementioned Roundup® products, Defendant impliedly warranted to its consumers and users—including

Plaintiffs and Plaintiffs' employers—that its Roundup[®] products were of merchantable quality and safe and fit for the use for which they were intended; specifically, as horticultural herbicides.

- 561. Defendant, however, failed to disclose that Roundup[®] has dangerous propensities when used as intended and that the use of and/or exposure to Roundup[®] and glyphosate-containing products carries an increased risk of developing severe injuries, including Plaintiffs' injuries.
- 562. Upon information and belief, Plaintiffs and Plaintiffs' employers reasonably relied upon the skill, superior knowledge and judgment of Defendant and upon its implied warranties that the Roundup[®] products were of merchantable quality and fit for their intended purpose or use.
- 563. Upon information and belief, Plaintiffs and Plaintiffs' employers reasonably relied upon the skill, superior knowledge and judgment of Defendant and upon its implied warranties that the Roundup[®] products were of merchantable quality and fit for their intended purpose or use.
- 564. The Roundup® products were expected to reach and did in fact reach consumers, users and those in proximity to users, including Plaintiffs, without substantial change in the condition in which they were manufactured and sold by Defendant.
- 565. At all relevant times, Defendant was aware that consumers, users, and those in proximity of users of its products, including Plaintiffs, would use Roundup[®] products as marketed by Defendant, which is to say that Plaintiffs were the foreseeable users of Roundup[®].
- 566. Defendant intended that its Roundup® products be used in the manner in which Plaintiffs in fact used or were exposed to them and Defendant impliedly warranted each product

to be of merchantable quality, safe, and fit for this use, despite the fact that Roundup[®] was not adequately tested or researched.

- 567. In reliance upon Defendant's implied warranty, Plaintiffs used or were in proximity to the use of Roundup[®] as instructed and labeled and in the foreseeable manner intended, recommended, promoted and marketed by Defendant.
- 568. Neither Plaintiffs nor Plaintiffs' employers could have reasonably discovered or known of the risks of serious injury associated with Roundup® or glyphosate.
- 569. Defendant breached its implied warranty to Plaintiffs in that its Roundup[®] products were not of merchantable quality, safe, or fit for their intended use, or adequately tested. Roundup[®] has dangerous propensities when used as intended and can cause serious injuries, including those injuries complained of herein.
- 570. The harm caused by Defendant's Roundup® products far outweighed their benefit, rendering the products more dangerous than an ordinary consumer or user would expect and more dangerous than alternative products.
- 571. As a direct and proximate result of Defendant's wrongful acts and omissions Plaintiffs have suffered severe and permanent physical and emotional injuries. Plaintiffs have endured pain and suffering, have suffered economic loss, including significant expenses for medical care and treatment, and will continue to incur these expenses in the future.
- 572. WHEREFORE, Plaintiffs pray for judgment against Defendant Monsanto in a fair and reasonable sum in excess of \$10,000,000, together with costs expended herein and such further and other relief as the Court deems just and appropriate.

COUNT SIX: WRONGFUL DEATH

- 573. Plaintiffs incorporate by reference every other paragraph of this Complaint as if each were set forth herein.
- 574. As a direct and proximate result of the acts and/or omissions of Defendant, as set forth herein, the Decedents named in this action used and/or were exposed to the Roundup[®] products.
- 575. Subsequent to such use, Decedents developed NHL, suffered substantial pain and suffering, both physical and emotional in nature, and subsequently died.
- 576. Plaintiffs, on behalf of themselves and all of the next of kin of Decedents, are entitled to recover damages as Decedents would have if they were living, as a result of acts and/or omissions of Defendant.
- 577. Plaintiffs, on behalf of themselves and all of Decedents' next of kin are also entitled to recover punitive damages and damages for substantial pain and suffering caused to Decedents from the acts and/or omissions of Defendant as fully set forth herein, including without limitations, punitive damages.
- 578. As a direct and proximate result of Defendant's conduct, Plaintiffs and Decedents [insert their names] have been injured and sustained severe and permanent pain, suffering, disability, impairment, loss of enjoyment of life, loss of care and comfort, and economic damages.
- 579. WHEREFORE, Plaintiffs demand judgment against Defendants, individually, jointly, severally, and in the alternative, requests compensatory damages, punitive damages, together with interest, costs of suit, attorneys' fees, and such further relief as the Court deems equitable and just.

COUNT SEVEN – PUNITIVE DAMAGES

- 580. Plaintiffs incorporate by reference every other paragraph of this Complaint as if each were set forth herein.
- 581. Defendant has acted willfully, wantonly, maliciously, with an evil motive, and recklessly in one or more of the following ways:
 - a. Defendants knew of the unreasonably high risk of NHL posed by the Roundup[®] products before manufacturing, marketing, distributing and/or selling the Roundup[®] products, yet purposefully proceeded with such action;
 - b. Despite their knowledge of the high risk of NHL associated with use and/or exposure to Roundup[®] products, Defendant affirmatively minimized this risk through marketing and promotional efforts and product labeling;
 - c. Through the actions outlined above, Defendant expressed a reckless indifference to the safety of users of Roundup[®] products, including Plaintiffs.
- 582. Defendant knew of the dangers and risks of Roundup[®] products, yet it concealed and/or omitted this information from labels and warnings contained on Roundup[®] products in furtherance of its knowing and willful actions.
- 583. These actions were outrageous because of Defendant's evil motive or a reckless indifference to the safety of users of Roundup[®] products and/or those who became exposed to it.
- 584. As a direct and proximate result of the willful, wanton, malicious, evilly motivated and/or reckless conduct of Defendant, the Plaintiffs have sustained damages as set forth above.
- 585. WHEREFORE, Plaintiffs pray for a judgment for punitive damages against

 Defendant, jointly and severally, in a fair and reasonable amount sufficient to punish Defendant

and deter it and others from engaging in similar conduct in the future, costs expended herein, and such further and other relief as the Court deems just and appropriate.

COUNT EIGHT – DAMAGES

- 586. Plaintiffs incorporate by reference every other paragraph of this Complaint as if each were set forth fully and completely herein.
- 587. Defendant knew of the dangerous condition of Roundup[®] products, including that they posed a danger to their consumers and non-consumers exposed to Roundup[®] products, including Plaintiffs, but chose not to include any warnings or information regarding the dangerous condition of Roundup[®] products.
- 588. Defendant showed complete indifference to or conscious disregard of the safety of Plaintiffs by their conduct described herein. Defendant knew or should have known failure to include a warning for Roundup[®] products would result in women using and/or being exposed to Roundup[®] products and subsequently developing NHL.
- 589. Plaintiffs are entitled to exemplary damages to punish Defendant and to deter Defendant and others in similar situations from like conduct.
 - 590. WHEREFORE, Plaintiffs pray for judgment against Defendant for
 - a. compensatory damages in an amount to be proven at trial;
 - b. exemplary damages;
 - c. costs, including reasonable attorneys' fees, court costs, and other litigation expenses; and
 - d. any other relief the Court may deem just and proper.

Dated: September 2, 2016

s/ Eric D. Holland

Eric D. Holland - (*Mo. Bar # 39935*) R. Seth Crompton - (*Mo. Bar #57448*)

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