

University of California
Permission to Use Personal Health Information for Research

Study Title: UCDCC#255 – Pilot Study of a [14C] Oxaliplatin Microdosing Assay to Predict Exposure and Sensitivity to Oxaliplatin-Based Chemotherapy in Advanced Colorectal Cancer

Sponsor/Funding Agency: UC Davis Comprehensive Cancer Center/ U.S. Department of Energy and National Cancer Institute

A. What is the purpose of this form?

State and federal privacy laws protect the use and release of your health information. Under these laws, the University of California or your health care provider cannot release your health information to the research team unless you give your permission. The research team includes the researchers and people hired by the University or the sponsor to do the research. If you decide to give your permission and to participate in the study, you must sign this form as well as the Consent Form. This form describes the different ways that the researcher, research team and research sponsor may use your health information for the research study. The research team will use and protect your information as described in the attached Consent Form. However, once your health information is released it may not be protected by the privacy laws and might be shared with others. If you have questions, ask a member of the research team.

B. What Personal Health Information will be released?

If you give your permission and sign this form, you are allowing your health care provider to release the following medical records containing your Personal Health Information. Your Personal Health Information includes health information in your medical records and information that can identify you. For example, Personal Health Information may include your name, address, phone number or social security number.

☒ Entire Medical Record

☐ Radiology Reports

☐ Pathology Reports

☐ Laboratory Reports

☐ Dental Records

☐ Operative Reports

☐ Other:

☐ Emergency Medicine
Center Reports

☐ Progress Notes

☐ History & Physical
Exams

☐ Discharge Summary

☐ Consultations

☐ Outpatient Clinic
Records

☐ EKG

☐ Radiology images

☐ Psychological Tests

☐ Health Care Billing
Statements

C. Do I have to give my permission for certain specific uses?

Yes. The following information will only be released if you give your specific permission by putting your initials on the line(s).

- ☐ I agree to the release of information pertaining to drug and alcohol abuse, diagnosis or treatment.
- ☐ I agree to the release of HIV/AIDS testing information.
- ☐ I agree to the release of genetic testing information.
- ☐ I agree to the release of information pertaining to mental health diagnosis or treatment as follows:

_____.

D. How will my Personal Health Information be used?

Your Personal Health Information may be released to these people for the following purposes:

1. To the research team for the research described in the attached Consent Form;
2. To others at UC who are required by law to review the research;
3. To others who are required by law to review the quality and safety of the research, including: U.S. government agencies, such as the Food and Drug Administration and Department of Health and Human Services, the research sponsor or the sponsor's affiliate organization, or government agencies in other countries. These organizations and their representatives may see your Personal Health Information. They may not copy or take it from your medical records unless permitted or required by law.

Your PHI used in this study will include all information which is used to determine your eligibility and collected from the procedures and tests that are carried out as part of this study. This may include, but is not limited to, the following types of medical information

- Medical information about you including your medical history and present/past medications.
- Results of exams, procedures and tests you have before and during the study.
- Laboratory test results.

E. How will my Personal Health Information be used in a research report?

If you agree to be in this study, the research team may fill out a research report. (This is sometimes called "a case report".) The research report will **not** include your name, address, or telephone or social security number. The research report may include your date of birth, initials, dates you received medical care, and a tracking code. The research report will also include information the research team collects for the study. The research team and the research sponsor may use the research report and share it with others in the following ways:

1. To perform more research;
2. Share it with researchers in the U.S. or other countries;
3. Place it into research databases;
4. Use it to improve the design of future studies;
5. Use it to publish articles or for presentations to other researchers;
6. Share it with business partners of the sponsor; or
7. File applications with U.S. or foreign government agencies to get approval for new drugs or health care products.

F. AM I REQUIRED TO SIGN THIS DOCUMENT?

No, you are not required to sign this document. You will receive the same clinical care if you do not sign this document. However, if you do not sign the document, you will not be able to participate in this research study.

G. Does my permission expire?

This permission to release your Personal Health Information expires 50 years when the research ends and all required study monitoring is over. Research reports can be used forever. You have the right to see and copy any of the research data gathered about you, but not until the study is complete. If the research data contains information that may affect your health or safety during your participation, the study staff will notify you and your personal care doctor(s) of the results. If needed, the study staff will send a copy of the relevant information to your personal care doctor(s) to help them evaluate your true condition.

H. Can I cancel my permission?

You may revoke your permission at any time. You can do this in two ways. You can write to the researcher or you can ask someone on the research team to give you a form to fill out to cancel your permission. If you cancel your permission, you may no longer be in the research study. You may want to ask someone on the research team if canceling will affect your medical treatment. If you cancel, information that was already collected and disclosed about you may continue to be used. Also, if the law requires it, the sponsor and government agencies may continue to look at your medical records to review the quality or safety of the study.

I. Signature

If you agree to the use and release of your Personal Health Information, please sign below. You will be given a signed copy of this form.

Subject's Name (print)

Subject's Signature

Date

Note: if the subject is a minor, an individual signing with an “X”, an adult incapable of giving consent, or is unable to read the authorization, fill out and attach the “special signatures” page (sections “J” and “K”).

SPECIAL SIGNATURES PAGE

J. If the subject is a minor, or an individual signing with an “X”, or an adult incapable of giving consent (where IRB approved), the legally authorized representative or witness signs here:

Legally Authorized Representative's Name
or Witness to the “X” (print)

Relationship to the Subject

Representative or Witness Signature

Date

K. If the subject is unable to read the authorization, the translator or reader and a witness sign here:

I have accurately and completely read this Authorization to _____
(subject's name) in _____ (language), the subject's primary language.
The subject has verbally affirmed his/her Authorization to me and to the witness.

Translator or Reader's Name (print)

Translator or Reader's Signature

Date

Witness Name (print)

Witness Signature

Date

**UNIVERSITY OF CALIFORNIA, DAVIS
CONSENT TO PARTICIPATE IN A RESEARCH STUDY**

STUDY TITLE: UCDC#255 – Pilot Study of a [¹⁴C]Oxaliplatin Microdosing Assay to Predict Exposure and Sensitivity to Oxaliplatin-Based Chemotherapy [Protocol Version 4.0 Dated: 07/14/2017]

Principal Investigator: Edward Kim, MD, PhD
Department: Internal Medicine Division of Hematology/Oncology

CALIFORNIA SUBJECT'S BILL OF RIGHTS FOR BIOMEDICAL RESEARCH STUDIES

The rights below are the rights of every person who is asked to be in a medical research study. As an experimental subject, you have the right to:

- Be informed of the nature and purpose of the research study.
- Be given an explanation of the procedures to be followed, and any drug or device to be used.
- Be given a description of common or important discomforts and risks reasonably to be expected from the study.
- Be given an explanation of any benefits you might expect.
- Be given a disclosure of any appropriate alternative procedures, drugs or devices that might be helpful, and their risks and benefits compared to this study.
- Be informed of the types of medical treatment, if any, that are available if complications should arise.
- Be given an opportunity to ask any questions concerning the study or the procedures involved.
- Be instructed that consent to participate in the study may be withdrawn at any time, and you may discontinue participation in the study at any time without it being held against you.
- Be given a signed and dated copy of this document.
- Be given the opportunity to decide to consent or not to consent to the study without force, fraud, deceit, duress, coercion, or undue influence.

INTRODUCTION

This is a research study. Research studies only include subjects who choose to participate. Your study doctor will explain the clinical trial to you. As a study participant you have the right to know about the procedures that will be used in this research study so that you can make the decision whether or not to participate. The information presented here is to make you better informed so that you may give or withhold your consent to participate in this research study. Please take your time to make your decision and discuss it with your family, friends, or with your personal physician. If you have any questions, you can ask your study doctor for more explanation.

You are being asked to take part in this study because you have colon, rectal, pancreatic, gastroesophageal, appendiceal cancers or small bowel adenocarcinoma that has not previously been treated with a chemotherapy drug called oxaliplatin and your doctor has recommended that you undergo treatment with a chemotherapy regimen that contains oxaliplatin along with 5-fluorouracil (5-FU) and leucovorin. This chemotherapy regimen is commonly referred to as FOLFOX. We hope to learn more about your type of cancer. You must be 18 years of age or older. In order to participate in this study, it will be necessary to give your written consent.

WHY IS THIS STUDY BEING DONE?

Oxaliplatin is approved by the US Food and Drug Administration (FDA) for the treatment of colon, rectal, pancreatic, gastroesophageal, appendiceal cancers or small bowel adenocarcinoma.

The goal of this study is to test the feasibility of using microdose-based diagnostics in combination with oxaliplatin-based chemotherapy for personalized cancer treatment.

WHY IS THIS STUDY BEING DONE? (continued)

^{14}C , a radioactive form of carbon, exists in nature and in your body at a low level. To evaluate the predictive diagnostic test of this study, we will label the oxaliplatin with ^{14}C to trace the drug in your body after it is injected. The dose of total radioactive oxaliplatin that you will receive is about 1% of the normal chemotherapy dose—enough to evaluate your body's response to the drug but without any expectation of toxic side effects. The dose of radiation from ^{14}C is less than one chest x-ray that you would have during your cancer work up. This dose of oxaliplatin and radiation should not cause

any adverse reaction in your body. Based on our previous studies, this amount of ^{14}C -labeled oxaliplatin is sufficient for the diagnostic study in patients. Shortly after the diagnostic data is collected, you will be administered oxaliplatin chemotherapy. Your individual response to the therapy as well as any toxic side effects that you encounter will be collected and correlated to the diagnostic test.

HOW MANY PEOPLE WILL TAKE PART IN THE STUDY?

We plan to enroll 6 people to this study at the University California Davis Comprehensive Cancer Center.

BEFORE YOU BEGIN THE STUDY

Before you are able to participate in this study, you must have a diagnosis of colon, rectal, pancreatic, gastroesophageal, appendiceal cancers or small bowel adenocarcinoma. If you choose to take part in this study and sign this informed consent form, you will complete "pre-study screening tests" to determine if you meet the study requirements. These exams, tests or procedures are part of regular cancer care and may be done even if you do not join the study. The pre-study screening tests are listed below.

Pre-study Screening Tests:

Within 28 days prior to registration a CT (computerized tomography scan) or MRI (magnetic resonance imaging) of the chest/abdomen/pelvis and other areas of known disease or newly suspected disease would be performed.

Description of Tests/Procedures:

- **Physical exam:** You will have a physical examination, similar to those done for regular medical care.
- **Blood drawing (venipuncture):** Blood tests will be done 14 days prior to registration. These tests will include a complete blood count and a chemistry panel.
- **CT scan:** you will have a computed tomography (CT) [computerized axial tomography (CAT)] scan of your chest, abdomen and pelvis, done every 8 weeks for 6 months and then every 12 weeks plus or minus 2 weeks thereafter, in order to check your response. A CT scan uses special x-ray equipment to make detailed pictures of body tissues and organs. You will need to lie still on a table with your body inside a large doughnut-shaped machine. The table will move and the machine will make clicking and whirring noises as the pictures are taken. Each CT scan will take about 15 minutes to a half hour.
- **MRI:** you may have a Magnetic Resonance Imaging (MRI) exam. For the MRI exam, you will lie down on a narrow bed, which will then be placed in a tunnel that is 6 feet long by 22 inches wide and open at each end. You will need to lie there quietly for about one hour, during which time there will be a loud banging noise. You may feel warm during this procedure. This would be done if your physician feels an MRI would provide better information regarding your disease response.
- **Pregnancy Test (if applicable):** Because the chemotherapy drugs and the drug in this study can affect a fetus, if you are a woman of childbearing potential, a urine (or blood) test will be done at the initial visit to make sure you are not pregnant.

WHAT WILL HAPPEN IF I TAKE PART IN THIS RESEARCH STUDY?

If you decide to participate in this study, you will be asked to do the following:

The following procedures are part of regular care and may be done even if you do not join the study:

You will be seen by the physician for a history and physical exam before each cycle of chemotherapy. You will have blood tests before each cycle of chemotherapy. These blood tests include complete blood count and chemistry panel to check your liver and kidney function. You will also have X-ray, CT and/or MRI after every two cycles (6 weeks) of chemotherapy while you are on the study.

The following procedures are NOT PART OF REGULAR CARE AND WILL ONLY BE DONE IF YOU JOIN THE STUDY:

If the screening exams, tests or procedures show that you can continue to be in the study, and you choose to take part, then you will have the following tests and procedures done.

There are two parts in this study. Oxaliplatin works by binding to DNA, the genetic material in your cells, forming drug-DNA damage called adducts. The first part of this study is to measure ¹⁴C-labeled oxaliplatin dose levels after administering a microdose of ¹⁴C-labeled oxaliplatin to you. We will also measure the levels of DNA adducts induced by administering a microdose with a blood test.

- You will have 8 ml (one teaspoon is 5ml) of blood drawn, and receive a microdose of ¹⁴C-labeled oxaliplatin infused over 2 minutes at the Cancer Center Infusion Center located at the third floor of Cancer Center, 4501 X Street, Sacramento, CA 95817.
- Four ml of blood samples are collected just before the administration of ¹⁴C-labeled oxaliplatin, and at 30 minutes, 1 hour, 1 hour 45 minutes, 2 hours, 2 hours 15 minutes, 3 hours, 4 hours, and 24 hours after starting the [¹⁴C]oxaliplatin infusion. To minimize the venipuncture, a temporary catheter will be placed in your forearm for blood draws.

The second part of this study is to receive chemotherapy combined with a microdose of ¹⁴C-labeled oxaliplatin.

- You will receive a chemotherapy regimen (FOLFOX) that contains oxaliplatin chemotherapy for the treatment of your cancer. Oxaliplatin is given through intravenous injection over two hours once every two weeks on the first day. This is called one cycle. During the first treatment, a microdose of ¹⁴C-labeled oxaliplatin will be administered with your treatment dose of oxaliplatin. The microdose of ¹⁴C-labeled oxaliplatin will only be administered with the first cycle of treatment.
- Four ml of blood samples are collected just before the administration of FOLFOX, and at 30 minutes, 1 hour, 1 hour 45 minutes, 2 hours, 2 hours 15 minutes, 3 hours, 4 hours, 24 hours and 48 hours post FOLFOX administration. To minimize the venipuncture, a temporary catheter will be placed in your forearm for blood draws.

You will continue to be treated with FOLFOX as directed by your doctor. You will be evaluated before each cycle of chemotherapy for any toxicity just like you receive any other chemotherapy. You will be evaluated for tumor response after every four cycles (8 weeks) with physician's visit, CT and/or MRI examination. You will continue to receive oxaliplatin chemotherapy if your cancer is responsive to this drug and you do not have a toxic response preventing further treatment or until your doctor decides it is time for a break from the oxaliplatin.

WHAT WILL HAPPEN IF I TAKE PART IN THIS RESEARCH STUDY? (continued)

Another way to find out what will happen to me during the study is to read the chart/table below.

PERIOD	Pre-Study ^a	Phase 0 Microdose		Cycle 1 Microdose			+ Ongoing Treatment		Off Study
		Day 1	Day 2	Day 1	Day 2	Day 3	Cycle 2, Day 1	Ongoing Treatment	
Safety Assessments^b									
History & Physical Exam	X			X			X	*	
Vital Signs	X	X		X			X	*	
Performance Status	X			X			X		
Hematology	X	X		X			X	*	
Serum Chemistries	X	X		X			X	*	
Pregnancy Test	X								
Adverse Events									
		X-----							
Efficacy Assessments									
Imaging Studies	X							X ^c	X
Treatments									
[¹⁴ C]Oxaliplatin Microdose		X		X					
FOLFOX				X-----			X	*	
Biologic Agent, if appropriate						X		*	
Correlative Studies									
Plasma Pharmacokinetics		X	X	X	X	X			
PBMCs (Peripheral Blood Mononuclear Cells) Blood Draw		X	X	X	X	X			

a Pre-study assessments within 14 days before registration, except for imaging studies within 28 days of registration

b All on study safety assessments may be performed +/- 72 hours of the indicated time point

c Every 8 weeks (+/- 1 week) for 6 months then every 12 weeks (+/- 2 weeks) until progression

* After Cycle 2, Day 1 and resolution of all microdose-associated toxicities, all safety assessments and treatments are at the discretion of the treating investigator according to good medical practice.

Study location: UC Davis is currently coordinating the enrollment of patients for this study at the sites listed below. We anticipate that your treatment will be administered (given) at the site of your enrollment.

UC Davis Comprehensive Cancer Center
4501 X Street
Sacramento, CA 95817

HOW LONG WILL I BE IN THE STUDY?

You will be asked to participate for as long as you are not having any unmanageable side effects. After you are finished with the [¹⁴C] oxaliplatin study procedures, your medical chart will be available to the researchers in order to monitor your progress during chemotherapy and follow up care. There are no extra follow-up visits or tests related to this study after the off study visit.

CAN I STOP BEING IN THE STUDY?

Yes. You can decide to stop at any time. Tell your study doctor if you are thinking about stopping or decide to stop. Your doctor will tell you how to stop safely. It is important to tell the study doctor if you are thinking about stopping so any risks from oxaliplatin can be evaluated by your doctor. Another reason to tell your doctor that you are thinking about stopping is to discuss what follow-up care and testing could be most helpful for you. If you are off study, you will need to have an off study visit, which will involve blood draws, bone scans, and CT if indicated.

Your study doctor may stop you from taking part in this study at any time if he or she believes it is in your best interest; if you do not follow the study rules; or if the study is stopped.

WHAT SIDE EFFECTS OR RISKS CAN I EXPECT FROM BEING IN THE STUDY?

Risks and side effects related to 5-fluorouracil (5-FU):

Likely risks related to 5-fluorouracil (events occurring greater than 20% of the time):

- Darkening of skin and nail beds; dry, flaky skin
- Decreased white blood cells, the infection-fighting cells, which could put you at risk for infection
- Decreased number of platelets, the blood-clotting cells, which could put you at increased risk of bleeding
- Nausea
- Vomiting
- Sores in the mouth or on the lips
- Thinning hair
- Diarrhea
- Brittle nail
- Increased sensitivity to the sun

Less likely risks related to 5-fluorouracil (events occurring less than or equal to 20% of the time):

- Darkening and stiffening of the vein used for giving the drug
- Decreased appetite
- Headache
- Weakness
- Muscle aches

Rare but serious risks related to 5-fluorouracil (events occurring less than or equal to 2-3 % of the time):

- Difficulty walking
- Irritation of the eyes
- Increased tearing of the eyes
- Blurred vision

While you are being treated with 5-fluorouracil and after you stop treatment, do not have any immunizations (vaccinations) without first asking your doctor for approval. Try to avoid contact with people who have recently received the oral polio vaccine and check with your doctor about this.

Risks and side effects related to leucovorin:

Side effects that you may experience with this drug are uncommon. These, however, include an allergic reaction, varying from an itchy rash to breathing difficulties. Measures are available to help you if these should occur.

WHAT SIDE EFFECTS OR RISKS CAN I EXPECT FROM BEING IN THE STUDY? (continued)

Leucovorin may interfere with the effects of anti-seizure medications such as phenobarbital, phenytoin, and primidone. When leucovorin is given together with the drug called 5-fluorouracil, it may increase its side effects.

Risks and side effects related to oxaliplatin chemotherapy:

Likely (events occurring greater than 20% of the time):

- Lack of enough red blood cells (anemia which may make you short of breath, weak, fatigued, or tired)
- Diarrhea, which could lead to dehydration
- Nausea or vomiting
- Fatigue or tiredness
- Abnormal liver function as seen on a blood test
- Decreased number of a type of blood cell (platelet) that helps to clot blood (may result in easy bruising or bleeding)
- Damage to nerves causing numbness, tingling, burning
- Decreased number of a type of white blood cell (lymphocyte) that can lead to infection
- Decreased number of a type of white blood cell (neutrophil/granulocyte) that can lead to infection
- Temporary hair thinning or loss
- Sores in the mouth and/or throat
- A sensation of pain or tingling in areas of the body that are exposed to cold air or cold liquid, such as your hands if placed in the refrigerator or your throat if exposed to a cold wind or drinking cold liquids (see the Additional Information section below).
- Dizziness
- Changes in fingernails
- Loss of appetite
- Taste changes
- Headache

Less likely (events occurring less than or equal to 20% of the time):

- Abnormal blood clotting and/or bleeding
- Fever associated with dangerously low levels of a type of white blood cell (neutrophils)
- Destruction of red blood cells
- Abnormal heart rhythm
- Hearing loss
- Inflammation of the ear
- Swelling and redness of the eye and eyelids.
- Dry or watery eyes
- Temporary vision problems caused by the cold
- Drooping eyelid
- Swelling around the nerve responsible for sight
- Belly pain
- Fluid collection in the abdomen
- Constipation
- Dry mouth
- Heartburn
- Difficulty swallowing
- Excess passing of gas
- Irritation of the stomach
- Bleeding in some organ(s) of the digestive tract, for example, blood in your stool
- Death of tissue somewhere in the digestive tract
- Sore (ulcer) in the digestive tract, including esophagus or intestines
- Blockage of the intestines with severe constipation
- Inflammation of the pancreas that can cause belly pain and may be serious
- Chills

WHAT SIDE EFFECTS OR RISKS CAN I EXPECT FROM BEING IN THE STUDY? (continued)

Less likely (events occurring less than or equal to 20% of the time): Continued

- Swelling of the face, arms or legs
- Fever
- Difficulty walking
- A condition in which both the liver and kidneys fail
- Irritation at the site of the IV
- Chest pain which is not heart-related
- Liver failure
- Increase in size of the liver
- Blockage of the veins of the liver leading to liver damage
- Allergic reaction (rash, redness, itching, watery or swollen eyes, throat swelling, shortness of breath)
- Infection
- Slow blood clotting as seen on a blood test: PTT, INR
- Abnormal kidney function as seen on a blood test
- Abnormal liver function as seen on a blood test
- Abnormal test of bone health: alkaline phosphatase
- Weight gain or weight loss
- Dehydration
- Increased or decreased blood sugar level
- Decreased levels of a protein called albumin
- Abnormal blood chemistries that could lead to abnormal heart, kidney, or nerve function: blood acid, uric acid, calcium, potassium, magnesium, sodium, phosphate
- Pain including joint, back, bone, and muscle
- Difficulty or limitation in ability to open mouth
- Sleepiness

Less likely (events occurring less than or equal to 20% of the time)

- Speech problems
- Abnormal or involuntary movements
- Bleeding in the brain
- Stroke or mini-stroke (TIA)
- A malfunction of the nerves within the head and neck
- Weakness or paralysis caused by damage to nerves
- Convulsion or seizure
- Anxiety
- Confusion
- Depression
- Difficulty sleeping or falling asleep
- Blood in the urine
- Bleeding in the kidney
- Need to urinate often
- Difficulty emptying the bladder
- Bleeding in male or female reproductive organs
- Stuffy or runny nose, sneezing
- Bleeding in the respiratory tract
- Throat tightness, shortness of breath, or a choking sensation (see the Additional Information section below)
- Cough, wheezing
- Hiccups
- Inflammation of the lungs
- Scarring of the lungs that can cause shortness of breath and interfere with breathing
- Problem of the sinuses
- Voice change

WHAT SIDE EFFECTS OR RISKS CAN I EXPECT FROM BEING IN THE STUDY? (continued)

Less likely (events occurring less than or equal to 20% of the time): (Continued)

- Dry skin
- Excess sweating
- Itching
- Skin rash or hives
- Sudden reddening of the face and/or neck
- Hot flashes
- High or low blood pressure
- Inflammation of a vein
- Formation of a blood clot that could break loose and be carried by the blood stream to block another blood vessel
- Swelling and redness of the skin on the palms of the hands and soles of the feet that could be serious
- Kidney damage that could be severe (see the Additional Information section below)

Rare but serious: (events occurring less than or equal to 2-3 % of the time):

- Formation of blood clots in small blood vessels around the body that leads to a low platelet (a type of blood cell that helps to clot blood) count
- Gas in the intestinal (bowel) wall
- Inflammation of the gallbladder possibly associated with gall stones
- Sudden or traumatic injury to the kidney
- Severe potentially life-threatening damage to the lungs which can lead to difficulty breathing
- Clotted catheter or catheter infection
- Severe diarrhea that may be life threatening
- Heart problems (chest pain, heart attack)
- Accumulation of fluid around the heart

Additional information about the risks of oxaliplatin

Exposure to cold (oxaliplatin): When receiving oxaliplatin, the nerves that affect your throat may be affected and cause a strange sensation when swallowing cold liquids. You should avoid cold beverages while you are participating in this study. You may also notice a tingling and numbness or pain in your hands and feet that worsen on exposure to cold. Extra layers of clothing (gloves, mittens and warm socks) may help these symptoms be less severe. If you should develop throat tightness, shortness of breath, or a choking sensation, contact your doctor immediately. In the patients treated with this drug, there have been 11 patients (of more than 50,000 who have been treated with oxaliplatin) who have had lung problems such as cough, shortness of breath, or trouble breathing. This caused scar tissue in the lungs and these events can be life threatening.

Inflammation of the nerves can become worse during the time you are receiving treatment, and the risk of developing it increases with the amount of oxaliplatin you receive. This inflammation usually goes away.

In some cases, oxaliplatin can cause a severe infection. This infection is serious and can be life threatening. Contact your physician immediately if you are experiencing severe diarrhea (more than 7 or 8 times per day), fever, as well as numbness or tingling in your hands, feet or throat, or weakness.

A few patients treated with oxaliplatin have developed kidney damage. The damage to the kidneys may lead to the need for kidney dialysis usually on a temporary basis. You may also develop a condition associated with the dysfunction of your kidneys called Hemolytic Uremic Syndrome. This syndrome can be serious and may lead to seizures, problems with the central nervous system, or coma.

Platinum drugs like oxaliplatin have been known to cause leukemia in a small number of patients. It is not known whether risk of future development of leukemia is a side effect of oxaliplatin. One case of leukemia and one case of myelodysplastic syndrome, a condition which could lead to leukemia, have been seen following oxaliplatin chemotherapy, although it is not certain that oxaliplatin caused these blood disorders.

Oxaliplatin has caused severe immune reactions in 2-3% of colon cancer patients, which can be fatal. These reactions are usually managed with other drug treatments such as epinephrine, corticosteroid and antihistamine therapy.

WHAT SIDE EFFECTS OR RISKS CAN I EXPECT FROM BEING IN THE STUDY? (continued)

General Risks:

- Venipuncture/Intravenous (IV) Needle Insertion: Routine laboratory tests and the research blood draws, which may result in bruising, infection and minor pain or discomfort comparable to a needle prick.
- Radiation (x-ray) risks: X-rays will be performed even if you do not participate in this trial. They are a part of the routine studies for the treatment of your cancer. This study involves a low radiation exposure from ¹⁴C-labeled oxaliplatin that is about the same as the radiation exposure from one chest x-ray. The amount of radiation exposure is below the level that is considered to be a significant risk of harmful effects.
- CT scan risks: CT scans will be performed even if you do not participate in this trial. They are not part of this study. They are part of the routine studies for the treatment of your cancer. CT scans involve radiation exposures that are higher than other diagnostic tests using ionizing radiation. The exposure to radiation from this study might result in a slight increase in cancer risk in normal healthy individuals. However, since you already have cancer, a risk estimate cannot be accurately determined.

In addition, if contrast material (iodine dye) is used, there is a slight risk of developing an allergic reaction, from mild (itching, rash) to severe (difficulty breathing, shock, or rarely, death). The contrast material may also cause kidney problems, especially if you are dehydrated or have poor kidney function. The study doctors will ask you about any allergies or related conditions before the procedure. If you have any of these problems, you may not be allowed to have a CT scan.

Having a CT scan may mean some added discomfort for you. In particular, you may be bothered by feelings of claustrophobia when placed inside the CT scanner, or by lying in one position for a long time. If contrast material is used, you may feel discomfort when it is injected. You may feel warm and flushed and get a metallic taste in your mouth. Rarely, the contrast material may cause nausea, vomiting or a headache.

- Reproductive Risks: You should not become pregnant or father a baby while on this study because the chemotherapy drugs you will receive and the drugs in this study can affect an unborn baby. Women should not breastfeed a baby while on this study. It is important to understand that you need to use birth control while on this study. Women of child-bearing potential must use hormonal or barrier contraception or abstinence and men must agree to barrier method or abstinence both must be used prior to study entry and 30 days after study participation. Even though ¹⁴C-labeled oxaliplatin used in this study is very small, the subsequent chemotherapy drugs you receive may make you unable to have children in the future.
- Unknown Risks: There is a very small chance the microdose in this study may cause the chemotherapy treatment that you receive after being on this study to be less effective.
- MRI risks: Because the MRI machine acts like a large magnet, it could move iron-containing objects in the MRI room during the examination. Precautions have been taken to prevent such an event from happening; loose metal objects, like pocket knives or key chains, are not allowed in the MRI room. The risks to a fetus from MRI are unknown; pregnant women cannot participate in this study.
- Unknown Risks: The experimental treatments may have side effects that no one knows about yet. The researchers will tell you of new information that might make you change your mind about participating in the study.

For more information about risks and side effects, ask your study doctor.

ARE THERE BENEFITS TO TAKING PART IN THE STUDY?

You may not benefit from taking part in this research. The information we get from this study may help us to learn more about this study treatment, and this may help future cancer patients.

WHAT OTHER CHOICES DO I HAVE IF I DO NOT TAKE PART IN THIS STUDY?

Your alternative is not to take part in this study. If you choose not to take part in this study, your future care will not be affected. Your other choices may include:

- Getting treatment or care for your cancer without being in a study
- Participating in a different study, if available
- Getting no treatment
- Getting comfort care, also called palliative care. This type of care helps reduce pain, tiredness, appetite problems, and other problems caused by the cancer. It does not treat the cancer directly, but instead tries to improve how you feel. Comfort care tries to keep you as active and comfortable as possible.

WILL MY MEDICAL INFORMATION BE KEPT PRIVATE?

We will do our best to make sure that your personal information will be kept private. However, we cannot guarantee total privacy. Your personal information may be given out if required by law.

If information from the study is published or presented at scientific meetings, your name and other personal information will not be used.

Organizations that may look at and/or copy your research records for research, quality assurance, and data analysis include:

- The investigators involved in the conduct of this study and their designees
- The financial sponsor of this study Accelerated Medical Diagnostics Incorporated
- The National Cancer Institute (NCI)
- The US Food and Drug Administration (FDA)
- The UC Davis Institutional Review Board (IRB)
- Lawrence Livermore National Laboratory

A description of this clinical trial will be available on <http://www.ClinicalTrials.gov>, as required by U.S. law. This Web site will not include information that can identify you. At most, the Web site will include a summary of study results. You can search this Web site at any time.

If we access protected health information (e.g., your medical record), you will be asked to sign a separate form to give your permission. Your medical records may become part of the research record. If that happens, your research records may be looked at by the sponsor of this study and government agencies or other groups associated with the study.

Federal law provides additional protections of your medical records and related health information. These are described in the UC Davis Health System Notice of Privacy Practices (<http://www.ucdmc.ucdavis.edu/legal/privacy/>) and in an attached document.

WHAT HAPPENS IF I AM INJURED BECAUSE I TOOK PART IN THIS STUDY?

It is important that you promptly tell the person in charge of this research if you believe that you have been injured because of taking part in this study. If you are injured as a result of being in this study, the University of California will provide necessary medical treatment. Depending on the circumstances, the costs of the treatment may be covered by the University or the study sponsor or may be billed to your insurance company just like other medical costs. The University and the study sponsor do not normally provide any other form of compensation for injury. For more information about compensation, you may call the IRB Administration at (916) 703-9151 or email at hs-IRBAdmin@ucdavis.edu

If the sponsor pays any of your medical expenses, we may be required to give the sponsor your name, date of birth, and Medicare ID or social security number.

WHAT ARE THE COSTS OF TAKING PART IN THIS STUDY?

Accelerated Medical Diagnostics, Inc. will provide [¹⁴C]Oxaliplatin free of charge for this study. Every effort will be made to ensure adequate supplies of [¹⁴C]Oxaliplatin for all participants.

There will be no charge to you or your insurance company for processing the research blood draws or research studies on your tumor biopsy tissue and blood tests. They will be paid for by the study. However, if the specimens are obtained during a standard diagnostic procedure, that procedure will be charged to you or your insurance company in the usual way.

5-FU, leucovorin, and oxaliplatin (FOLFOX) are commercially available and will be billed to you and/or your insurance company.

You or your insurance carrier will be responsible for the associated costs of administering FOLFOX including infusion room charges, costs of the drugs, all routine laboratory tests, x-rays, scans, clinic visits or hospital stays. However, you or your insurance carrier will not be asked to bear the cost of any tests or procedures done solely for research purposes.

Whenever possible, pre-authorization will be obtained. If the costs are not covered, these costs will be discussed prior to proceeding with the study.

For more information about possible costs, please contact the research team. The research team can follow UC Davis Uninsured Non-Emergency Estimate Policy (Policy ID 1883) to work with their department and Decision Support Services to get you a cost estimate.

WILL I BE COMPENSATED FOR BEING IN THIS STUDY?

You will not be compensated for your participation in this study.

Samples taken during this study may be used for research and development purposes not related to your treatment or condition. You will not have any property rights or ownership interest in products or data which may be derived from your samples.

WHAT ARE MY RIGHTS IF I TAKE PART IN THIS STUDY?

Taking part in this study is your choice. You may choose either to take part or not to take part in the study. If you decide to take part in this study, you may leave the study at any time. No matter what decision you make, there will be no penalty to you and you will not lose any of your regular benefits. Leaving the study will not affect your medical care. You can still get your medical care from our institution.

We will tell you about new information or changes in the study that may affect your health or willingness to continue in the study.

DOES THE RESEARCHER HAVE A FINANCIAL INTEREST IN THIS RESEARCH STUDY?

The Principal Investigator does not have any personal or financial interest in this study. Edward Kim, MD, MS from the UC Davis Cancer Center is conducting the study. Some of the specimens obtained from you during this study will be analyzed at Lawrence Livermore National Laboratory (LLNL), Livermore, CA. The University of California at Davis Cancer Center, the United States Department of Energy, and National Cancer Institute (NCI) are funding part of this clinical study. The Department of Energy is giving money to LLNL so that the study doctors from UC Davis and LLNL can conduct the study. NCI is giving money to a company named Accelerated Medical Diagnostics, Inc. to support this trial. Drs. Pan and Henderson, co-investigators have ownership interest in Accelerated Medical Diagnostics, Inc.

Bio-specimens (such as blood, tissue, or saliva) collected from you for this study and/or information obtained from your bio-specimens may be used in this research or other research, and shared with other organizations. You will not share in any commercial value or profit derived from the use of your bio-specimens and/or information obtained from them.

WHO CAN ANSWER MY QUESTIONS ABOUT THE STUDY?

If you have questions, concerns, or complaints, or think the research has hurt you, talk to the research team at [REDACTED]. If you are unable to reach the Principal Investigator of this study, please contact the clinical research coordinator (CRC) responsible for your care. The CRC's contact information will be provided to you. The CRC will assist you in contacting another investigator for this study. For non-emergency issues you can call the UCDMC Hospital Operator (916-734-2011), tell the Operator you are participating in a research study and you wish to talk to the medical oncologist on call. In the case of an emergency, dial 911 from any phone.

UC Davis Contact information (including the 24-hour number) is summarized below:

Edward Kim, M.D. [REDACTED]
[REDACTED]

This research has been reviewed and approved by an Institutional Review Board ("IRB"). Information to help you understand research is on-line at <http://www.research.ucdavis.edu/policiescompliance/irb-admin/>. You may talk to an IRB staff member at [REDACTED] for any of the following:

- Your questions, concerns, or complaints are not being answered by the research team.
- You cannot reach the research team.
- You want to talk to someone besides the research team.
- You have questions about your rights as a research subject.
- You want to get information or provide input about this research.

WHERE CAN I GET MORE INFORMATION?

You may call the National Cancer Institute's Cancer Information Service at:

1-800-4-CANCER (1-800-422-6237)

You may also visit the NCI Web site at <http://cancer.gov/>

- For NCI's clinical trials information, go to: <http://cancer.gov/clinicaltrials/>
- For NCI's general information about cancer, go to <http://cancer.gov/cancerinfo/>

VOLUNTARY CONSENT:

My signature below will indicate that I have decided to participate in this study as a research subject. I have read and understand the information above. I understand that I will be given a signed and dated copy of this consent form and the Bill of Rights.

Signature of Subject

Printed Name of Subject

Date

Signature of Person Obtaining Consent

Printed Name of Person Obtaining Consent

Date


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**SIGN BELOW ONLY IF A WITNESS WILL OBSERVE THE CONSENT PROCESS (for use with IRB “Short Form”)**

Signature of Witness to Consent Process

Printed Name of Witness

Date

| APPROVED by the Institutional Review Board<br>at the University of California, Davis |                   |
|--------------------------------------------------------------------------------------|-------------------|
| Protocol                                                                             | Approved          |
| 736253                                                                               | November 15, 2017 |