



National Coordinating Center
for the Regional Genetics Networks

**The National Coordinating Center for the
Regional Genetics Networks**

**Glossary of
Cancer Genetics Terms**

English – Chinese

2023 Edition

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In collaboration with:
**The Cross Cultural Health Care
Program (CCHCP)**

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Acknowledgments

Mission of the NCC

The National Coordinating Center for the Regional Genetics Networks (NCC) has been funded by the Health Resources and Services Administration (HRSA) since 2004. Our mission is to improve access to genetics for underserved populations. This mission is accomplished through different programs, many of which are educational tools and resources for non-genetics professionals. Learn more at <https://nccrcg.org>.

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Cindy Roat is an international consultant in language access in health care and patient navigation. She provides training and consulting for health care interpreters, providers, administrators, and patient navigators. Cindy compiled and edited this glossary for the NCC.

The Cross Cultural Health Care Program

The mission of The Cross Cultural Health Care Program (CCHCP) is to serve as a bridge between communities and health care institutions to advance access to quality health care that is culturally and linguistically appropriate. CCHCP provides resources, such as bilingual medical glossaries, as well as medical interpreter, patient navigator, and cultural competence training for individuals and institutions with the goal of systems change. Learn more at: <https://xculture.org>

CCHCP is supporting and coordinating the translation process of this glossary and is providing the glossary free of charge in its online store: <https://xculture.org/store/>

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Preface

The seven Regional Genetics Networks (RGNs), the National Genetics Education and Family Support Center (Family Center), and the National Coordinating Center for the Regional Genetics Networks (NCC) mission is to improve access to quality genetic services for medically underserved populations. This bilingual glossary of terms related to cancer genetics is provided to help enable access to cancer genetics medical services to limited English proficiency populations.

How to Use the Glossary

This glossary is organized alphabetically in English. The first column shows the term in English. The second column has the definition of the term in English. The third column has the translation of the term.

At the end of the translations of the cancer genetics terms is a page with Examples of Genes That are Often Checked in Genetic Testing, and a glossary of translations for Family Relationships Terms. It is very important for genetic counselors to know if a relative is a blood relative or a relative by marriage. There is also a page on Common Interpreting Errors, and a page on Analogies. Genetic counselors often use analogies to explain complex ideas in genetics.

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Glossary of Terms

English – Chinese

(n) – noun (v) – verb (adj) – adjective (adv) – adverb

Term	Definition	Traditional/ 繁體中文	Simplified/ 简体中文
Abnormal (adj)	Different from what is considered normal, average or expected; e.g., a gene sequence that is different than that found in most people.	異常的	异常的
Benign (adj)	Something mild that does not threaten health or life. In cancer genetics, “benign” means “not cancerous.”	良性的	良性的
Blood test (n)	A test in which blood is drawn (usually from the patient’s arm) and sent to a laboratory for analysis. In cancer genetics, blood tests provide cells for genetic sequencing.	驗血	验血
Breast cancer (n)	Cancer of the breast tissue. This cancer is more common in women, but it can affect men as well.	乳腺癌	乳腺癌
Buccal swab (n)	A way to collect DNA from the cells on the inside of a person's cheek.	口腔黏膜測試	口腔黏膜检测
CA-125 blood test (n)	A blood test used to look for early signs of ovarian cancer in women with a high cancer risk.	CA-125 驗血 癌抗原 125 血液檢測	CA-125 验血 癌抗原 125 血液检测
Carrier (n)	A person who carries a genetic mutation in one of the two copies of a particular gene, regardless of whether they get cancer or not.	基因攜帶者	携带者
Cell (n)	A small (microscopic) structure that forms the basic building block of every known living organism.	細胞	细胞
Chromosome (n)	Thread-like structures located inside the nucleus of cells. In humans, there are 23 pairs of chromosomes, for a total of 46 chromosomes. Each chromosome is made of proteins and a single molecule of DNA, which carries genetic information.	染色體	染色体
Colonoscopy (n)	A diagnostic test in which a flexible tube with a tiny camera on the end is inserted into the colon (large intestine) through the rectum in order to see the condition of the inside of the colon, or to take a small sample of tissue, or to cut out polyps (small growths).	結腸鏡檢查 (俗稱照大腸) 結腸鏡檢查 (俗稱大腸鏡)	结肠镜检查 (简称肠镜)

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
Condition (e.g., “genetic condition”) (n)	A chronic (long-term) health issue.	病症 (例如「遺傳病」)	病症 (例如“遗传病”)
Consanguinity (n)	When parents are blood relatives to each other.	血緣	血缘
DCIS (ductal carcinoma in situ) (n)	A pre-cancerous growth in the breast, which is still within the milk ducts but has the potential of growing and spreading to other parts of the breast tissue. Sometimes called Stage 0 breast cancer.	DCIS (乳腺導管原位癌) (導管原位癌)	DCIS (乳腺导管原位癌) (导管原位癌)
DTC (direct-to-consumer genetic testing) (n)	Genetic testing that is marketed directly to people at home through the internet or the TV etc. instead of through a medical provider.	DTC (直接面向消費者的基因檢測)	DTC (直接面向消费者的基因检测)
Deleterious mutation/ Disease-causing mutation (n)	A change in a person’s DNA that may cause a medical condition. In cancer genetics, having a disease-causing mutation may increase the chance of getting cancer but does not mean that a person will definitely get cancer.	有害突變 / 致病性突變	有害突变/ 致病性突变
DNA (deoxyribonucleic acid) (n)	The molecule that carries the genetic information of a cell. It provides the instructions used in the development, functioning and reproduction of the organism of which it is a part. The DNA is organized into chromosomes.	DNA (脫氧核糖核酸)	DNA (脱氧核糖核酸)
DNA banking (n)	The secure, long-term storage of a person’s genetic material. DNA banking allows families to have access to a deceased family member’s DNA. When new genetic testing techniques are developed, doctors can test the banked DNA and use genetic information from the deceased person to tailor medical treatment for living descendants.	DNA 資料庫 (基因資料庫)	DNA 资料库 (基因资料库)
DNA marker (also called a “genetic marker”) (n)	A readily recognizable genetic trait, gene, or DNA segment.	脫氧核糖核酸標記(也稱為遺傳標記)	脱氧核糖核酸标记 (也称为“遗传标记”)
DNA mutation (n)	A change in the typical order of the chemicals that make up the DNA. Mutations or variants are often compared to misspelled words because chemicals that make up the DNA sequence are not in the expected order.	脫氧核糖核酸突變	脱氧核糖核酸突变
DNA sequence (n)	The exact order of the chemicals that make up a DNA molecule.	脫氧核糖核酸序列	脱氧核糖核酸序列

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
DNA sequencing (n)	The laboratory technique used to determine the exact order of the chemicals that make up a DNA molecule. This is one type of genetic testing.	脫氧核糖核酸定序	脱氧核糖核酸测序
Dominant (adj)	A genetic trait in which one copy of the gene is sufficient for a trait to be expressed; dominant traits can be inherited from a single parent. In cancer genetics, dominant inheritance refers to conditions in which having only one altered copy of a particular gene pair is sufficient to cause an increased risk for cancer.	顯性的/顯著的	显性的
Duplication (n)	A duplication occurs when part of a chromosome is copied abnormally, resulting in extra genetic material.	複製	复制
Early age of onset (n)	Cancer diagnosed at an early age, usually before the age of 50.	疾病早发性 (癌症早發)	疾病早发性 (癌症早发)
Egg (n)	The reproductive cells of a woman. When fertilized by sperm, the egg will grow into a baby.	卵子	卵子
Environmental causes or factors (n)	Causes of illness that come from a person's surroundings, not from their genetic make-up. Environmental causes of illness include infection, trauma, diet, exposure to toxins, etc. Some environmental causes of illness can be avoided or changed, while genetic causes cannot.	環境原因或因素	环境原因或因素
Familial (adj)	Belonging to a family; e.g., a familial trait is a trait that is shared among family members and may be due to genetic or environmental factors or both.	家族性的	家族性的
Family history (n)	The medical history of the members of a family.	家族史	家族史
Flip a coin (v)	A random decision-making tool used in the U.S. While a coin is flipped into the air and caught, a person predicts whether it will fall with the "heads" side up or the "tails" side up. If the coin falls as predicted, the person "wins." This expression is often used as a metaphor for any outcome that is random and has two possible outcomes, and to describe a situation in which each outcome is as likely as the other.	拋幣而定 (廣東話俗語「擲銀仔」)	掷硬币
Fragment (n)	A small piece; an incomplete part of a whole.	碎片	片段

Term	Definition	Traditional/ 繁體中文	Simplified/ 简体中文
Gene (n)	A specific sequence of DNA that determines specific traits in an individual.	基因	基因
Gene copy (n)	In human cells, DNA is arranged in 23 pairs of chromosomes, for a total of 46 chromosomes. These chromosomes contain all the genes that make up the DNA. One chromosome of each pair is inherited from each parent. As such, individuals have two copies of every gene, one inherited from the mother and one inherited from the father.	基因復制	基因拷贝
Normal gene copy (n)	A normal copy of a gene is one that is found most frequently in the population. Also called the “working copy.”	正常基因復制	正常基因拷贝
Altered gene copy (n)	An altered copy of a gene is one that differs from the working copy and is considered to be “abnormal.” Also called the “non-working copy.”	變異基因復制	变异基因拷贝
Gene deletion (n)	Having a piece of genetic information missing from a gene.	基因刪除	基因缺失
General population (n)	<p>“Most people.”</p> <p>For example, if you have the same risk of getting cancer as the general population, that means that you have the same chance of getting cancer as everyone else. This is in contrast to a “high risk population” who has a greater chance of getting cancer than everyone else.</p>	一般人口	一般人群
Generation (n)	<p>The people who constitute a single step in a line of descent from an ancestor; a group of people born and living more or less at the same time.</p> <p>Example: You, your brothers and sisters, all your spouses and your cousins are in the same generation. Your parents, your aunts and uncles and all their spouses form a previous generation. Your grandparents, their siblings and spouses form an even earlier generation. Your children and nieces and nephews form a later generation.</p>	一代人 / 同一代人	一代人
Genetic (adj)	Having to do with inherited traits.	遺傳性的	遗传性的
Genetic counseling (n)	A discussion with a genetic counselor about the basic concepts of genetics, genetic conditions, the chances of being affected by a genetic condition or having a child with a genetic condition, and genetic testing and treatment.	遺傳諮詢	遗传咨询

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
Genetic counseling intern (n)	A genetic counseling student who has not yet completed his/her academic studies and is now practicing under the supervision of a more experienced counselor in preparation for providing genetic counseling services independently after obtaining his/her graduate degree.	遺傳諮詢實習生	遗传咨询实习生
Genetic counselor (n)	A healthcare professional with a specialized graduate degree who works with people undergoing genetic testing. Genetic counselors provide information about genetic conditions, help patients understand their chances of being affected by a genetic condition or having a child with a genetic condition, and help them make informed decisions about testing and treatment. Genetic counselors also provide emotional support to patients and families.	遺傳諮詢師/遺傳顧問	遗传咨询师
Genetic discrimination (n)	The act of refusing to provide, or charging more for, insurance or any service based on an individual's genetic make-up.	基因歧視	基因歧视
Genetic factors (n)	Specific aspects of a person's genetic make-up that influence that person's health and development.	遺傳因素	遗传因素
Genetic information (n)	The information encoded in genes, which tells every cell in a body how to grow, what to do and how to reproduce.	遺傳資訊	遗传信息
Genetic material (n)	All the parts of a cell that carry genetic information. Genetic material could include genes, parts of genes, a group of genes, a DNA molecule, a fragment of DNA, a group of DNA molecules, or the entire set of genetic instructions.	遺傳物質	遗传物质
Genetic predisposition (n)	An increased chance of a person developing a certain trait or disease based on that person's particular genetic makeup.	遺傳傾向性	遗传倾向性

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
Genetic test (n)	A laboratory test designed to determine if a person has a gene mutation or a typical DNA sequence.	基因檢測	基因检测
Single gene test (n)	Single gene test: analysis of one particular gene.	單一基因檢測	单一基因检测
Gene panel test (n)	Gene panel test: analysis of several genes that have been shown to be associated with a particular condition; Example: breast cancer gene panel.	基因組測試	基因组检测
Genetic trait (n)	A characteristic within a family that is passed down from parent to child genetically.	遺傳特徵	遗传特征
Geneticist (n)	A doctor or scientist who studies genetics.	遺傳學家	遗传学家
Germline testing (n)	<p>Germline testing refers to the analysis of a person's DNA, which he or she inherited from his or her parents.</p> <p>In biology and genetics, the germline is the group of cells that will pass on the genetic material to children, in other words, the cells from which the eggs and sperm come. After the egg and sperm come together to form a baby, these cells will then divide and multiply and will form the entire body.</p> <p>Germline testing is different from testing the DNA of someone's tumor, which may have a mutation that happened during the person's lifetime and was not inherited from his or her parents.</p>	殖源基因檢查	生殖系检测
Hereditary (adj)	Passed down from parent to child.	遺傳性的	遗传性的
Hereditary material (n)	Genetic material that is passed down from parent to child.	遺傳物質	遗传物质

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
Informed consent (n)	The process of agreeing to a procedure or course of treatment after understanding what the procedure/treatment entails, the potential risks and benefits associated with it, and the other options available.	知情同意書	知情同意书
Inheritance pattern (n)	The manner in which a particular genetic trait or disorder is passed from a parent to a child, e.g., autosomal dominant or recessive, X-linked dominant or recessive, or multifactorial.	遺傳模式	遗传模式
Inherited (adj)	Passed down from parent to child.	遺傳的	遗传的
Lynch syndrome (n)	An inherited genetic disorder that increases a person's risk of getting cancer of the colon, rectum, uterus, ovaries, and other cancers.	林奇氏症候群	林奇综合症
Malignant (adj)	In cancer, this term means that the cancer cells or tumor are harmful and have the potential of spreading to other tissues or parts of the body.	惡性的	恶性的
Metastasis (n)	The spreading of cancer from one organ to another.	轉移	转移
Molecule (n)	The smallest unit of a chemical compound that still has the properties of that compound. For example, a molecule of water is made up of two hydrogen atoms and one oxygen atom. Separately, they are just atoms, but when bonded together, they make a water molecule.	分子	分子
Multifactorial (adj)	Due to a combination of genetic and non-genetic (environmental, hormonal, etc.) risk factors that act together to determine risk.	多因素的	多因素的
Mutation (n)	A change in a gene, which can be deleterious (disease causing) or benign (non-disease-causing). In Spanish, the word is sometimes confused with "mutilation."	突變	突变
Oncologist (n)	A physician who specializes in diagnosing and treating cancer.	腫瘤科醫生 (腫瘤医师)	肿瘤科医生 (肿瘤医生)
Oophorectomy	The surgical removal of one or both ovaries.	卵巢切除手術	卵巢切除手术
Ovarian cancer (n)	Cancer of the ovaries, the organs in a woman that release eggs.	卵巢癌	卵巢癌

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
Packets of genetic information (n)	A phrase genetic counselors use to describe genes or chromosomes.	基因資訊 (封包)	遗传信息包
Pattern (n)	A repeating arrangement or sequence; for example, the pattern of cancers in a family.	模式	模式
Pedigree (n)	A family tree that can be used to trace the inheritance of specific genetic traits.	血統/血系	家谱
Penetrance (n)	The probability that a specific genetic trait will be expressed if a person carries a mutation. “Complete penetrance” means that everyone who carries a particular gene mutation will show the trait related to that altered gene. “Incomplete penetrance” means that only some of the people who have the altered gene will actually show the related trait.	外顯率	外显率
Predisposition to cancer	Having a change in one of number of specific genes (a genetic mutation) that creates a higher than normal risk of a person developing cancer.	癌症易患性	癌症易患性
Prognosis (n)	The most likely outcome of a disease process.	病程預測 / 預後	预后
Proliferation (cell proliferation) (n)	The controlled process by which a cell multiplies. Cancer arises when the process of cell division becomes uncontrolled.	增殖 (細胞激增))	增殖 (細胞激增))
Prophylactic mastectomy (n)	A mastectomy is the surgical removal of the breast. “Prophylactic” means something done to prevent disease. A prophylactic mastectomy is the surgical removal of a healthy breast to prevent breast cancer. Prophylactic mastectomy is an option for individuals with a very high breast cancer risk, for example, women with a BRCA mutation.	預防性乳房切 除術	预防性乳房切 除手术
Protein (n)	A molecule made up of chains of amino acids. Proteins do most of the work in cells and are required for the structure, function, and regulation of the body's tissues and organs. Genes determine how specific amino acids are put together to form a specific protein.	蛋白質	蛋白质
Random (adj)	Happening in an unpredictable way.	隨機的	随机的

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
Recessive (adj)	A genetic trait in which both copies of a gene are needed for the trait to be expressed; recessive traits are inherited from both parents, each one contributing one copy of the gene in question. In cancer genetics, recessive inheritance refers to conditions in which both copies of a particular gene pair need to be altered to develop the disease.	隱性的	隐性的
Recurrence (n)	When something happens again. In cancer, a return of the disease after treatment and after a period of time during which the cancer cannot be detected.	復發性 (復發)	复发性 (复发)
Red flag (n)	A warning sign or a clue.	警告信號	危险信号
Risk (n)	The chance that something will happen; in the case of cancer genetics, the chance of getting cancer.	風險	风险
At risk (adj)	Has some possibility of getting cancer.	有風險的	有风险的
At average risk (adj)	Has the same possibility of getting cancer as the general population.	一般風險的	平均风险的
At high risk (adj)	Has a greater possibility of having a genetic condition than the general population.	高風險的	高风险的
At higher risk than “X” (adj)	Has a greater possibility of getting cancer than the general population. Has a greater possibility of getting cancer than “X.”	風險高於 「X」的	风险高于 “X”的
Risk factor (n)	A circumstance that increases the risk of getting cancer.	風險因素	风险因素
Runs in the family (e.g., cancer runs in the family) (v)	Is passed down from parents to children to grandchildren.	家族遺傳	家族遗传
Saliva (spit) test (n)	A genetic test done by collecting saliva (spit) instead of blood.	唾液（口水） 測試	唾液（口水） 样本
Screen (v)	To test a person for a particular common health problem, even though the person has no symptoms to suggest that they have the problem.	篩檢	筛查
Screening test (n)	A test that looks for a common health problem even though the patient has no symptoms to suggest they have the particular disease.	篩檢測試	筛选检测

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional/ 繁體中文	Simplified/ 简体中文
Sperm (n)	The reproductive cells of the man. When sperm fertilize a woman’s egg, a baby develops.	精子	精子
Sporadic (adj)	Random, once in a while. In genetics, sporadic cancers are those caused by random chance or unknown factors in the environment.	偶發性的	偶发性的
Statistically significant (adj)	Not caused by chance.	有統計意義的	有统计学意义的
Syndrome (n)	A group of symptoms or features that consistently occur together or a condition characterized by a set of associated features. For example, a hereditary cancer syndrome refers to risk for a group of cancers all caused by a particular gene mutation. BRCA1 mutations increase risk for breast and ovarian cancers. This is called Hereditary Breast and Ovarian Cancer Syndrome. See also, Lynch Syndrome.	綜合症 (症候群)	综合症 (症候群)

Term	Definition	Traditional/ 繁體中文	Simplified/ 簡體中文
<p>Test result (n)</p> <p>Negative (adj)</p> <p>True negative (n)</p> <p>Uninformative negative (n)</p> <p>Positive (adj)</p> <p>Variant of uncertain significance (n)</p> <p>Polymorphism (n)</p>	<p>A negative result on a genetic test means that the laboratory did not find the specific genetic change that the test was designed to identify.</p> <p>When a patient is being tested to see if he or she has a specific genetic change that is present in other family members, a negative result can be considered a “true negative.” This means that instead of having an increased risk for cancer like other family members, they have the same risk as everyone else in the general population.</p> <p>Sometimes a family has a strong history of a particular cancer, but no genetic change related to that cancer has been found in that family. An “uninformative negative” result means that a specific test was negative but is not conclusive because the “family” mutation has not been identified, and/or there may be changes that the test could not detect in the gene being analyzed, or in other genes that were not tested.</p> <p>A positive result on a genetic test means that the laboratory did find a specific genetic change that is associated with a hereditary cancer syndrome (a deleterious mutation). In cancer genetics, that means that the patient has an increased risk of getting the cancer(s) associated with the gene.</p> <p>If the laboratory finds a genetic change for which currently there is not enough information to know if this change is problematic or not, it reports a “variant of uncertain significance.” Basically, this means that the laboratory found a genetic change, but they don’t know what it means. All of these variants will eventually be reclassified as either a “positive” or “negative” result. Most become “negative” and are thought to represent natural variation between individuals.</p> <p>Everyone has some degree of commonly occurring genetic changes that are not associated with cancer. If the test finds this sort of change, it reports a “polymorphism.”</p>	<p>測試結果</p> <p>陰性的</p> <p>真陰性</p> <p>未提供資訊的陰性</p> <p>陽性的</p> <p>意義不明確的變異</p> <p>多態現象 / 多態性 / 多型性</p>	<p>检测结果</p> <p>阴性的</p> <p>真阴性</p> <p>未提供信息的阴性</p> <p>阳性的</p> <p>意义不明确的变异</p> <p>多态性</p>
Trait (n)	A characteristic.	特徵	特征
Tumor (n)	An abnormal growth of cells; a tumor can be benign (not harmful) or malignant (harmful, cancer).	腫瘤	肿瘤

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional/ 繁體中文	Simplified/ 简体中文
Tumor testing (n)	An analysis of the DNA of someone’s tumor. This analysis is meant to identify changes that a person might have acquired in his/her tumor cells that are not present in the rest of his/her body cells and were not inherited from his/her parents. This testing is often done to help make treatment decisions.	腫瘤檢測 / 腫瘤測試	肿瘤检测 / 肿瘤测试
Typo (n)	A mistyped word; shortened slang for “typographical error.” In genetic counseling “a typo” is commonly used as an analogy to refer to mutations or variants in a gene.	串錯字	错字
Ultrasound (n)	An imaging method that uses high frequency sound waves to create a picture of something inside the body.	超聲波	超声波
Variant (n)	A version of something that differs from the norm. So, a genetic variant is a change to the usual genetic sequence.	變異	变异

Examples of Genes That are Often Checked in Genetic Testing

Term	Definition	Translation
BRCA 1 BRCA 2	<p>“The Breast Cancer Genes.”</p> <p>The tumor suppressor genes that in mutated form tend to be associated with an increased risk of certain cancers, especially breast and ovarian cancers.</p>	<p>BRCA1 乳腺癌 1 号基因蛋白 BRCA2 乳腺癌 2 号基因蛋白</p>
MLH1 MSH2 MSH6 PMS2	<p>“The Colon Cancer Genes.”</p> <p>These genes are involved in fixing mistakes that occur when DNA replicates. An abnormality in one of these genes can lead to Lynch Syndrome, a condition linked to increased risk of cancer in the colon, rectum, uterus, ovaries, as well as other organs.</p>	<p>MLH1 基因 MSH2 基因 MSH6 基因 PMS2 基因</p>
ATM	<p>The ATM gene helps create a protein located in the cell nucleus that controls the rate at which cells grow and divide. The ATM protein also helps cells recognize damaged DNA strands.</p> <p>A mutation in the ATM gene can lead to increased risks for cancer or a condition called ataxia-telangiectasia a degenerative neurological condition that causes severe disability.</p>	<p>ATM 肿瘤抑制基因</p>
PALB2	<p>Another gene in which mutations can lead to breast cancer and possibly other cancers.</p>	<p>PALB2 肿瘤抑制基因</p>

Family Relationships

For genetic counselors, it is very important to know if a relative is a blood relative or a relative by marriage.

Term	Definition	Traditional 繁體中文	Simplified 簡體中文
Parent	Your mother or father.	父母	父母
Mother	For genetic purposes, the woman whose egg was fertilized and grew to be you.	母親	母亲
Mother-in-law	Your husband or wife's mother.	岳母/婆婆	岳母
Stepmother	Your father's wife who is not your biological mother.	繼母	继母
Adoptive mother	A woman who is not your biological mother but who accepted legal responsibility for and raised you.	養母	养母
Godmother	A woman chosen by your parents to be your spiritual guide in life, named as such through a ceremony in the Catholic church.	教母 契母/ 契媽 (Formal/informal acceptance of kinship in a non-Christian context)	教母
Father	For genetic purposes, the man whose sperm fertilized the egg that grew to be you.	父親	父亲
Father-in-law	Your husband or wife's father.	岳父/公公 老爺 / 家公	岳父
Stepfather	Your mother's husband who is not your biological father.	繼父	继父
Adoptive father	A man who is not your biological father but who accepted legal responsibility for and raised you.	養父	养父
Godfather	A man chosen by your parents to be your spiritual guide in life, named as such through a ceremony in the Catholic church.	契父/ 契爺 (formal/informal acceptance of kinship in a non-Christian context)	教父

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional 繁體中文	Simplified 简体中文
Aunt	Your mother or father's sister or sister-in-law.	阿姨 (younger aunt) 姨媽 (older aunt)	姨妈/舅妈/姑妈/伯母/叔母
Maternal aunt	Your mother's sister or sister-in-law.	舅母 / 舅媽 (wife of mother's older brother)	姨妈/舅妈
Paternal aunt	Your father's sister or sister-in-law.	姑姑 / 姑媽 (father's older sister/ father's younger sister) 孀孀 (wife of father's younger brother) 伯母 (wife of father's older brother)	姑妈/伯母/叔母
Uncle	Your mother or father's brother or brother-in-law.	小舅 (younger uncle) 大舅 (older unlce)	舅舅/姨夫/伯父/叔叔/姑父
Maternal uncle	Your mother's brother or brother-in-law.	姨丈 (husband of mother's sister)	舅舅/姨夫
Paternal uncle	Your father's brother or brother-in-law.	叔叔/ 叔父(father's younger brother) 伯父 (father's older brother) 姑丈/ 姑爹(husband of father's sister)	伯父/叔叔/姑父

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional 繁體中文	Simplified 簡體中文
Cousin	Usually understood to be a first cousin. Your aunt or uncle's child.	堂(表)兄弟姊妹	堂/表兄弟姐妹
First cousin			
First cousin once removed	Your aunt or uncle's grandchild or your first cousin's child	堂兄弟姊妹(father's side) 表兄弟姊妹 (mother's side)	堂/表侄子/侄女
Second cousin	The children of first cousins are second cousins to each other.	遠房堂兄弟姊妹 (father's side) 遠房表兄弟姊妹 (mother's side)	远房堂/表侄子/侄女
Grandparent	Your parent's father or mother.	祖父母	外祖父母/祖父母
Grandmother	Your mother or father's mother.	祖母	外祖母/祖母
Maternal grandmother	Your mother's mother.	阿婆	外祖母
Paternal grandmother	Your father's mother.	阿嫲	祖母
Grandfather	Your mother or father's father.	祖父	外祖父/祖父
Maternal grandfather	Your mother's father.	外公/阿公	外祖父
Paternal grandfather	Your father's father.	阿爺/爺爺	祖父
Great aunt	Your mother or father's aunt.	姑婆 / 伯婆 / 妯娌 / 姨婆 / 叔婆	姑/姨祖母
Maternal great aunt	Your mother's aunt.		姨祖母
Paternal great aunt	Your father's aunt.	姑婆 / 伯婆 / 妯娌 / 姨婆 / 叔婆	姑祖母

Term	Definition	Traditional 繁體中文	Simplified 簡體中文
Great uncle	Your father or mother's uncle.	舅公 / 姑公 / 姨公	伯/舅祖父
Maternal great uncle	Your mother's uncle.	伯祖(父) (older brother)	舅祖父
Paternal great uncle	Your father's uncle.	叔公 (younger brother)	伯祖父
Great grandparents	The parents of any of your grandparents.	曾祖父母	曾祖父母
Great grandmother	The mother of any of your grandparents.	曾祖母	曾祖母
Great grandfather	The father of any of your grandparents.	曾祖父	曾祖父
Siblings	The children of your father and mother.	兄弟姊妹	兄弟姐妹
Half siblings	Siblings (brothers and sisters) who have either the same mother and different fathers, or the same father but different mothers. Half siblings share some genetic similarity with you.	同父異母或同母異父的兄弟姊妹	胞兄弟姐妹
Stepsiblings	The children of your stepmother but not your father; or the children of your stepfather but not your mother. Stepsiblings do not share any genetic similarity with you.	繼兄弟姊妹	继兄弟姐妹
Twins	Two siblings born at the same time.	雙胞胎	双胞胎
Identical twins	Twins who developed from the same egg and sperm, meaning that they are genetically identical. Also called monozygotic twins.	同卵雙胞胎	同卵双胞胎
Fraternal twins	Twins who developed from different eggs and sperm, meaning that they are genetically different and have the same number of shared genes as any other sibling. Also called dizygotic twins.	異卵雙胞胎	异卵双胞胎
Triplets	Three siblings born at the same time.	三胞胎	三胞胎

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional 繁體中文	Simplified 簡體中文
Sister	A sibling who is a girl.	姊妹	姐妹
Sister-in-law	Your brother's wife or your husband's sister.	嫂嫂/嫂子 (older brother's wife) 弟媳 (younger brother's wife)	嫂子/弟妹/大 姑子/小姑子
Half sister	A girl who is either the child of your father with a different mother, or the child of your mother with a different father.	同父異母姊妹 (same father) 同母異父姐妹 (same mother)	胞姐妹
Stepsister	The daughter of your stepmother or stepfather and therefore not biologically related to you.	繼姊妹	继姐妹
Brother	A sibling who is a boy.	兄弟	兄弟
Brother-in-law	Your sister's husband or your wife's brother.	姊夫 (older sister's) 妹夫 (younger sister's)	姐夫/妹夫/妻 兄/妻弟
Half brother	A boy who is either the child of your father with a different mother, or the child of your mother with a different father.	同父異母兄弟 (same father) 同母異父兄弟 (same mother)	胞兄弟
Stepbrother	The son of your stepmother or stepfather and therefore not biologically related to you.	繼兄弟	继兄弟
Niece	Your sibling's daughter.	姪女(brother's daughter) 外甥女(sister's daughter)	侄女/外甥女
Nephew	Your sibling's son.	姪子(brother's son) 外甥(sister's son)	侄子/外甥
Spouse	Your husband or wife.	配偶	配偶
Wife	The woman to whom you are married.	妻子	妻子
Husband	The man to whom you are married.	丈夫	丈夫

Term	Definition	Traditional 繁體中文	Simplified 簡體中文
Children	Genetically speaking, the people who are produced from your egg or sperm.	子女	孩子
Daughter	Your child who is a girl.	女兒	女儿
Daughter-in-law	Your son's wife.	媳婦	儿媳
Stepdaughter	Your spouse's daughter who is not your biological child.	繼女	继女
Adoptive daughter	A girl for whom you have accepted legal responsibility and raised even though she is not your biological child.	養女	养女
Goddaughter	A girl for whom you have accepted spiritual responsibility within a ceremony of the Catholic church; she may or may not be biologically related to you.	教女 契女 (Formal/informal acceptance of kinship in a non-Christian context)	教女
Son	Your child who is a boy.	兒子	儿子
Son-in-law	Your daughter's husband.	女婿	女婿
Stepson	Your spouse's son who is not your biological child.	繼子	继子
Adoptive son	A boy for whom you have accepted legal responsibility and raised even though he is not your biological child.	養子	养子
Godson	A boy for whom you have accepted spiritual responsibility within a ceremony of the Catholic church. He may or may not be biologically related to you.	教子 契子/契仔 (Formal/informal acceptance of kinship in a non-Christian context)	教子
Ancestor	A person from whom you are descended, usually more remote than a grandparent.	祖先	祖先
Fiancé(e)	The person whom you have promised to marry. Man: fiancé Woman: fiancée	未婚夫 (妻)	未婚夫/妻

Glossary of Cancer Genetics Terms – Chinese

Term	Definition	Traditional 繁體中文	Simplified 簡體中文
Domestic partner	The person with whom you are living and have an intimate relationship, but to whom you are not married.	同居伴侶	同居伴侶
Divorced	Having ended a marriage.	離婚	离婚
Engaged	Having promised to marry someone.	訂婚	订婚
Widow	A woman whose husband has died.	寡婦 / 遺孀	寡妇
Widower	A man whose wife has died.	鰥夫	鳏夫
Relative	A person in your family.	親戚	亲戚
Blood relation	A person who is related to you by blood not marriage, e.g., your sister, but not your sister-in-law; your mother but not your stepmother; your daughter but not your adopted daughter.	血親	血缘关系
Next of kin	Your closest living blood relation.	近親	直系亲属

Common Interpreting Errors

Source speech	Interpreted as	More accurate rendition
“Cancer just happens by chance.”	“Cancer happens suddenly.” “Cancer happens because you are unlucky. “	“Sometimes we don’t know what causes cancer.”
Cancer genes	Cancer cells	Genes that may cause cancer when altered (mutated).
“You are at higher risk for developing cancer.”	Getting cancer	There is a greater possibility that you might get cancer.
“These genes protect us against cancer.”	“They protect us, like the immune system . . . They kill cancer cells . . .”	“These genes help us to not get cancer.”
Colonoscopy	Scan	Colonoscopy

Analogies

Genetic counselors often use analogies to explain complex ideas in genetics. An analogy explains a new concept by comparing it to something more common. A clue that an analogy is being used are the words “It’s as if” and “It’s like”

Examples:

“Genes are **like** an instruction book or an instruction manual. And in a book, there is a certain sequence to a story.”

“**It’s as if** you were reading through a long book and looking for one typo, for a letter that is mistaken.”

“In the DNA there are molecule strings – **like** in this picture, each letter is a different molecule string.”

“So a mutation is **like** a broken gene.”

“So a mutation is **like** an unexpected change in the order of the letters.”

“A gene is **like** a recipe, and mutations are like changes in that recipe.”

“It’s **like** chapters in a book, and like misspellings.”

“Our cells are **like** libraries and our chromosomes are like books.”

“**Like** a flip of a coin.” (to explain that there is a 50% chance that a mutation will be passed on every time the patient has a child).

“Inside every cell are genes, which are **like** instruction books for our bodies; they tell our bodies how to grow and develop.”

“It is kind of **like** if you a reading a book = and you notice that a word is spelled wrong; that is what this genetic test looks for.”

Genetic counselors may mix the analogy in with more literal descriptions:

Example:

“We know that there are two in particular that when they don’t work right, **when there’s a typo in the instruction manual**, they can cause a high risk for breast and ovarian cancer.”

Some analogies may not work with certain patients, due to linguistic or experiential differences.

Analogies that focus on genes as “letters in a book” may make no sense to speakers of character-based written languages such as Chinese, Japanese, and Korean.

“**It’s as if** you were reading through a long book and looking for one typo, for a letter that is mistaken.”

“So a mutation is **like** an unexpected change in the order of the letters.”

“It’s **like** chapters in a book, and like misspellings.”

“It is kind of **like** if you a reading a book and you notice that a word is spelled wrong; that is what this genetic test looks for.”

Analogies that focus on genes as a recipe may not work for patients who do not cook with written recipes.

“A gene is **like** a recipe, and mutations are like changes in that recipe.”

Analogies that discuss random chance in terms of a coin toss may not work for patients from cultures where people don’t flip coins to make decisions.

“**Like** a flip of a coin” (to explain that there is a 50% chance that a mutation will be passed on every time the patient has a child).

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