

# Englist.me



## Vocabulary Builder Reference from...

*Hyunsoo Joshua No: Performing brain surgery without a scalpel | TED Talk*

[https://www.ted.com/talks/hyunsoo\\_joshua\\_no\\_performing\\_brain\\_surgery\\_without\\_a\\_scalpel](https://www.ted.com/talks/hyunsoo_joshua_no_performing_brain_surgery_without_a_scalpel)

### All Words

#### IMPORTANT

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## Session 1: Word List

### brain

*n.* the organ inside the head that is responsible for one's movement, thought, memory, and feeling

*synonym*: intellect, mind, encephalon

(1) basic **brain** function, (2) permanent **brain** damage

X-rays revealed a small tumor in his **brain**.

### surgery

*n.* medical treatment of injuries or diseases involving an incision with instruments and often removing or replacing some parts of the body; the branch of medical science that treats disease or injury by operative procedures

*synonym*: operation, (medical) procedure

(1) cardiac **surgery**, (2) the professor of **surgery**

He had undergone heart **surgery** years before.

### incision

*n.* a sharp cut made in something with a sharp tool, especially during a medical procedure

*synonym*: cut, slit, laceration

(1) **incision** tool, (2) small **incision**

Patients undergoing **incisional** surgery are often put to sleep by anesthesia.

## scalpel

*n.* a small, sharp knife or blade used in surgery or dissection for cutting tissue or separating parts of the body

*synonym* : knife, surgical instrument, blade

(1) surgical **scalpel**, (2) precision **scalpel**

The surgeon used an electric **scalpel** to make a precise incision during the operation.

## procedure

*n.* a way of doing something, especially the official or well-known way

*synonym* : action, approach, course

(1) undergo a surgical **procedure**, (2) standard **procedure**

The pilot and flight attendant ran through the check-out **procedure**.

## shield

*n.* a protective covering or structure, especially in the past, that soldiers held in front of their bodies to protect themselves

*synonym* : guard, protection, safeguard

(1) a heat **shield**, (2) a **shield** for protecting against a bullet  
Lead is an effective **shield** against X-rays, gamma rays, and other harmful radiation.

## emit

*v.* to give off or send out something such as light, heat, sound, gas, etc.

*synonym* : give off, radiate, expel

(1) **emit** a gamma ray, (2) **emit** air pollution

During the unloading, the container box **emits** a clicking sound.

## invisible

*adj.* impossible or nearly impossible to see

*synonym* : hidden, imperceptible, unseen

(1) an **invisible** asset, (2) **invisible** stars

The phenomenon is **invisible** at optical wavelengths.

## beam

*n.* a long, sturdy piece of timber, metal, or other material used to support a structure or span a distance; a ray or

stream of light emitted by a source

*synonym* : ray, ray of light, shaft of light

(1) **beam** of light, (2) a structural **beam** of a building

The sun's **beam** shone through the window and illuminated the room.

## precise

*adj.* sharply exact or accurate or delimited

*synonym* : accurate, exact, distinct

(1) **precise** analyses, (2) estimate **precise** costs

The content is **precise** and informative for me.

## stereotactic

*adj.* relating to a precise, three-dimensional coordinate system used in medical procedures and diagnostic imaging, such as stereotactic surgery, which involves the use of a rigid head frame or a specialized device to target a specific area of the brain or other body part

*synonym* : precise, accurate, exact

(1) **stereotactic** biopsy, (2) **stereotactic** radiosurgery

The surgeon used a **stereotactic** device to target the tumor during the procedure precisely.

## radiation

*n.* the energy that comes from a nuclear reaction in the form of rays, waves, or particles and that can be hazardous to health

*synonym* : dissemination, emission, irradiation

(1) exposure to **radiation**, (2) electromagnetic **radiation**

He tried every possible treatment, including chemotherapy and **radiation** therapy.

## destroy

*v.* to ruin or damage severely or completely; to eradicate or eliminate completely

*synonym* : demolish, ruin, obliterate

(1) **destroy** the ecosystem, (2) **destroyed** evidence

The building was **destroyed** in the fire and had to be rebuilt.

## tumor

*n.* a mass of diseased tissue that forms when cells in the body divide and grow in an uncontrolled way

*synonym* : neoplasm, mass, lump

(1) **tumor** growth, (2) **tumor** at remote sites

The patient was diagnosed with a **tumor** in her lung.

## gradual

*adj.* happening slowly over a long period of time or distance; not steep or abrupt

*synonym* : incremental, gradational, piecemeal

(1) a **gradual** process, (2) a **gradual** change

The country experienced a **gradual** increase in population.

## scrub

*v.* to clean something thoroughly, typically with a brush and soap or detergent

*synonym* : clean, wash, sanitize

(1) **scrub** off graffiti, (2) **scrub** dirt from potatoes

She decided to **scrub** the kitchen floor to remove all the dirt and grime.

## malignant

*adj.* having an evil or harmful nature or effect; cancerous, tending to invade or spread rapidly

*synonym* : evil, harmful, cancerous

(1) **malignant** tumor, (2) **malignant** growth

The doctors found **malignant** cells in the patient's biopsy, indicating a severe illness.

## process

*n.* a series of actions or operations performed to achieve a particular outcome or goal; a systematic procedure or approach used to accomplish a specific task or objective; a method of treating milk to make it suitable for consumption or use in other dairy products

*synonym* : procedure, method, system

(1) **process** improvement, (2) decision-making **process**

The **process** for applying for a visa can be lengthy and complicated.

## X-ray

*n.* a type of electromagnetic radiation that has a wavelength shorter than visible light allowing hidden objects such as bones and organs inside the body to be

photographed

*synonym*: roentgenogram, photon radiography

(1) **X-ray** scan, (2) an **X-ray** of arteries

The doctor ordered an **X-ray** to see if there was any damage to the bones.

## dimension

*n.* a measurable extent of a particular kind, such as width, height, or length

*synonym*: extent, measurement, size

(1) new **dimension**, (2) the crosswise **dimension**

Overall **dimensions** are approximately 400x200mm.

## rev

*n.* a measure of the rate at which an engine or motor rotates, often expressed in revolutions per minute (RPM); (verb) to increase the number of rotations per minute

*synonym*: revolution, RPM, speed

(1) low- **rev** engine, (2) **rev** up the crowd

He stepped on the gas pedal, and the engine released a loud **rev**.

## locate

*v.* to specify or determine the exact position of someone or something

*synonym*: discover, find, place

(1) **locate** a missing pet, (2) **locate** a tumor

The robot can accurately **locate** construction material.

## calculate

*v.* to judge or find out the amount or number of something by using mathematics

*synonym*: compute, figure, estimate

(1) **calculate** the distance, (2) **calculate** his credit score

He couldn't **calculate** the actual value of the artwork.

## density

*n.* the quality of compactness of a substance

*synonym*: tightness, viscosity

(1) population **density**, (2) higher pixel **density**

Do you know the **density** of the population in Hong Kong?

## tissue

*n.* an ensemble of similar cells of the animal or plant that together carry out a specific function

*synonym* : structure, texture, anatomy

(1) a facial **tissue**, (2) loss of muscle **tissue**

The researcher separated the nervous **tissue** for microscopic examinations.

## propagate

*v.* to spread or promote something widely, particularly beliefs, ideas, or plants and animals through reproduction

*synonym* : propagate, multiply, reproduce

(1) **propagate** a rumor, (2) **propagate** plants

The company is working hard to **propagate** their brand message to as many people as possible

## optimize

*v.* to make the best or most effective use of something  
*synonym* : advance, amend, improve

(1) **optimize** a process, (2) **optimize** control for cooling

The essence of economics is to **optimize** the allocation of limited resources.

## magnetic

*adj.* having the properties of attracting or repelling certain materials containing iron or steel

*synonym* : attractive, drawing, hypnotic

(1) **magnetic** field, (2) a **magnetic** tape

The **magnetic** force of the earth keeps our planet spinning.

## resonance

*n.* a deep, full, or reverberating sound or tone; a quality or feeling of a particular emotional or mental vibration or significance; a mutual or sympathetic connection or correspondence between two things

*synonym* : echo, vibration, reverberation

(1) **resonance** frequency, (2) harmonic **resonance**

The singer's voice filled the auditorium with beautiful **resonance**.

## assist

v. to help someone in doing anything

*synonym*: help, support, aid

(1) **assist** a patient, (2) **assist** his goal

Please **assist** her with the furniture relocation.

## outline

v. to describe the main facts or aspects involved in something

*synonym*: recap, summarize, digest

(1) **outlined** the plan, (2) **outline** the findings

This page **outlines** our response planning for an emergency.

## crucial

*adj.* extremely vital or necessary

*synonym*: essential, pivotal, vital

(1) **crucial** information, (2) a **crucial** issue for women

The revitalization of technology companies is **crucial** to the country's growth.

## individually

*adv.* separately or apart from others

*synonym*: separately, one by one, independently

(1) answer questions **individually**, (2) **individually** designed product

Each department has done its product costing **individually**.

## converge

v. to move or draw together at a specific location; (of lines) to move towards the same point where they join or meet

*synonym*: congregate, assemble, concentrate

(1) **converge** of a series, (2) **converge** from different points

The two rivers **converge** into one near this area.

## inescapable

*adj.* impossible to avoid or evade

*synonym*: unavoidable, inevitable, ineluctable

(1) **inescapable** fate, (2) an **inescapable** position

The consequences of his actions were **inescapable**, and he had to face the consequences.

## spotlight

*n.* a beam of light used to illuminate a particular area or person

*synonym*: limelight, stage light, highlight

(1) **spotlight** effect, (2) **spotlight** moment

The singer was in the **spotlight** as she performed her hit song.

## combine

*v.* to join or merge to form a single thing or group

*synonym*: coalesce, cohere, blend

(1) **combine** chemically with another substance,

(2) **combine** augmented reality

Hydrogen and oxygen **combine** to form water.

## ray

*n.* a narrow line of light, heat, or another form of energy

*synonym*: beam, light, glimmer

(1) opaque to X- **rays**, (2) effect of cosmic **rays**

Gamma **rays** penetrate body tissues and cause cell damage.

## addition

*n.* the act or process of adding something to something else; the process of adding numbers

*synonym*: accumulation, expansion, addendum

(1) chemical **addition**, (2) **addition** of vectors

In **addition**, private corporations provide healthcare services.

## surrounding

*adj.* that is near or around, or closely encircling something

*synonym*: circumferent, encircling, neighboring

(1) **surrounding** areas, (2) a fence **surrounding** a castle

The **surrounding** mountains make the city difficult to be invaded.

## relative

*adj.* considered and evaluated through comparison with something else

*synonym*: comparative, proximate, congeneric

(1) a remote **relative**, (2) **relative** factors

Most countries prohibit sexual activity between certain close **relatives**.



## flexibility

*n.* the quality of changing or being changed easily according to new conditions or situations

*synonym* : elasticity, adaptability, resilience

(1) mental **flexibility**, (2) the **flexibility** of the body

We dealt with those problems with speed and **flexibility**.

## adjust

*v.* to make a minor modification to something to make it more suited for a new set of conditions or to make it function better.

*synonym* : adapt, alter, acclimate

(1) **adjust** a schedule, (2) **adjust** the rearview mirror

You have to **adjust** your content to the age of the audience.

## intense

*adj.* (especially of a feeling) very strong; extremely sharp or severe

*synonym* : extreme, fierce, harsh

(1) **intense** heat, (2) develop **intense** itching

That statement by the prime minister drew **intense** international criticism.

## spare

*adj.* additional to what is necessary for ordinary use; (verb) to give time, money, space, etc. to someone

*synonym* : extra, excess, (verb) afford

(1) **spare** parts, (2) **spare** cost

I made plans to spend my **spare** time beneficially.

## critic

*n.* someone who expresses opinions about the quality of books, music, etc.

*synonym* : pundit, analyst, attacker

(1) art **critic**, (2) severe **critic**

Advocates for legal reform hear less harsh words from their **critics**.

## structure

*n.* the way of construction of something and the arrangement of its parts, or a complex thing constructed of many parts

*synonym* : construction, architecture, establishment

(1) the **structure** of a machine, (2) **structure** and function of the brain

The organizational **structure** of start-ups is often flat and straightforward.

## ingenious

*adj.* showing inventiveness and ability or skill

*synonym*: creative, innovative, inventive

(1) **ingenious** device, (2) **ingenious** idea

I always look forward to reading his stories since they're so **ingenious**.

## intersect

*v.* to meet or cross one another

*synonym*: cross, bisect, cut

(1) **intersect** at a point, (2) railways **intersect** the country

Her multidisciplinary works **intersect** music and picture with writing.

## strike

*v.* to wallop somebody or something with the hand, fist, or weapon; to have an emotional or cognitive impact upon

*synonym*: hit, impact, influence

(1) **strike** up a conversation, (2) **strike** a blow

We **strike** to achieve more wages and safer working conditions.

## mass

*n.* a large amount of a substance with no definite shape or form; a large number of people or things grouped or crowded together

*synonym*: abundance, crowd, mob

(1) a **mass** of molten rock, (2) critical **mass**

The **mass** of people who do not own property is politically impotent.

## cancer

*n.* abnormal growth of cells that can invade and destroy surrounding tissues and organs; a disease characterized by the uncontrolled growth and spread of abnormal cells

*synonym*: tumor, carcinoma, malignancy

(1) **cancer** diagnosis, (2) **cancer** research

Breast **cancer** is the most common type of cancer in women.

## essentially

*adv.* relating to the essential features or concepts of anything

*synonym*: fundamentally, basically, virtually

(1) **essentially** correct, (2) become **essentially** same

**Essentially**, a society is an organism.

## shear

*v.* to cut or trim with scissors or shears; to remove something by cutting or tearing it away from something else; to become severed or split apart by force acting parallel to the plane of a surface; (noun) a cutting tool used to trim or cut materials such as fabric, hair, or metal

*synonym*: clip, cut, crop

(1) **shear** a hedge, (2) **shear** force

I need to **shear** the wool off of the sheep before winter.

## breakdown

*n.* a failure or collapse of a system or organization

*synonym*: collapse, failure, malfunction

(1) a nervous **breakdown**, (2) **breakdown** maintenance

The **breakdown** of the machinery caused a delay in production.

## cascade

*n.* a small waterfall or series of small waterfalls; a succession of stages or operations or processes or units

*synonym*: waterfall, watercourse, step

(1) **cascade** connection, (2) transistor **cascade**

The **cascade** of waterfalls in the national park was a breathtaking sight.

## indirectly

*adv.* not going straight to the point; implying or suggesting something

*synonym*: circuitously, obliquely, by implication

(1) **indirectly** related, (2) **indirectly** impact

The CEO **indirectly** expressed her disappointment with the

project's progress.

## damage

*v.* to harm or cause injury to something or someone, often resulting in decreased value or functionality; to impair or negatively affect something, such as a reputation or relationship; (noun) harm or injury that is caused to a person, thing, or entity

*synonym*: harm, impair, injure

(1) **damage** a relationship, (2) **damage** assessment

During the surgery, the doctor had to be extremely cautious not to **damage** a blood vessel.

## immediately

*adv.* now or without delay

*synonym*: directly, instantly, promptly

(1) **immediately** recall a product, (2) write him an answer **immediately**

A suspension order from the court is effective **immediately**.

## unstable

*adj.* lacking solidity, persistence, or firmness and therefore not strong, safe, or likely to continue; lacking control of one's emotions

*synonym*: shaky, unbalanced, inconsistent

(1) mentally **unstable**, (2) **unstable** weather

The tower proved to be **unstable** in the high wind.

## particle

*n.* a small piece of something; a word or piece of a term with grammatical function but little or no significance

*synonym*: atom, grain, bit

(1) charged **particle**, (2) **particle** energy

We can calculate the position of the **particles** statistically.

## radical

*adj.* relating to the essential aspects of anything; far beyond the norm, mainly used of opinions and actions

*synonym*: extreme, revolutionary

(1) a **radical** flaw in the plan, (2) a **radical** cure

The government established by the coup was more **radical** than before.

## hazardous

*adj.* involving risk or danger; unsafe or unhealthy

*synonym* : dangerous, risky, unsafe

(1) **hazardous** material, (2) **hazardous** conditions

The **hazardous** chemicals must be handled with extreme care to avoid any accidents.

## environment

*n.* the natural world such as air, water, and land in which humans, animals, and plants live

*synonym* : atmosphere, surroundings, climate

(1) **environment** affairs, (2) chaotic **environment**

Every human is responsible for taking care of the Earth's **environment**.

## inhospitable

*adj.* harsh and difficult to stay in or grow; unfriendly and unwelcoming towards people who visit you

*synonym* : sterile, unfriendly, unwelcoming

(1) **inhospitable** environment, (2) in an **inhospitable** manner

He trekked across some of the most **inhospitable** mountains in the world.

## immediate

*adj.* happening or done without delay or occurring shortly after something else

*synonym* : prompt, quick, instantaneous

(1) take **immediate** effect, (2) the **immediate** past

Both forts were subject to **immediate** attacks.

## vicinity

*n.* the area or region surrounding or in the general vicinity of a particular place or location; a nearby or neighboring region

*synonym* : proximity, nearness, locality

(1) immediate **vicinity**, (2) city and its **vicinity**

The area in the **vicinity** of the mall is known for its heavy traffic congestion.

## coverage

*n.* the reporting or news of an important event, sports, subject, etc.; the amount, range, area, or quality of

something that something provides

*synonym* : reportage, scope, range

(1) full- **coverage** insurance, (2) contractual **coverage**

The scandal received widespread media **coverage**.

## mechanism

*n.* a part of a machine, or a set of parts that performs a task; a natural or established process that occurs during a specific situation or reaction

*synonym* : means, method, system

(1) the **mechanism** for DNA replication, (2) defense **mechanism**

He discovered unique **mechanisms** for photochemical reactions.

## immune

*adj.* protected against a particular disease or toxin due to the presence of specific antibodies or sensitized white blood cells

*synonym* : resistant, unsusceptible, unaffected

(1) **immune** from criminal prosecution, (2) the cell of the **immune** system

The vaccination does not necessarily make you completely **immune**.

## sweep

*v.* to clean something, especially a floor or an area, by using a broom; move swiftly and smoothly

*synonym* : clean, clear, brush off

(1) **sweep** up dead leaves, (2) **sweep** a room with a glance

The politician tried to **sweep** the embarrassing incident under the rug.

## husk

*n.* the dry, outer covering of a seed, grain, or fruit, such as the shell of a nut or the skin of a corn kernel

*synonym* : shell, covering, outer layer

(1) **husk** removal, (2) seed **husk**

The **husk** of the coconut was removed to reveal the fruit inside.

## flush

*v.* to become red on your face, especially because you are embarrassed, angry, or hot; to rinse, clean, or empty something, especially a toilet, by causing large quantities of water to flow

*synonym*: redden, burn, suffuse

(1) the blood **flush** into my face, (2) **flush** the toilet

The girl **flushed** when a young man whistled as she walked by.

## transform

*v.* to change in outward structure or looks;

*synonym*: alter, convert, change

(1) **transform** an education system, (2) **transform** heat into power

My father's death **transformed** my life completely.

## scar

*n.* a mark that remains on the skin after a wound has healed

*synonym*: blemish, imperfection, blotch

(1) burn **scar**, (2) carry a **scar**

Even after the wound has healed, a **scar** remains.

## innovation

*n.* the creation of a new device or process resulting from study and experimentation

*synonym*: invention, initiation, creation

(1) **innovation** leader, (2) cutting-edge **innovation**

The vegetarian burger was an **innovation** that quickly spread to the United Kingdom.

## typical

*adj.* having the usual characteristics or traits of a specific group of things

*synonym*: characteristic, usual, distinctive

(1) **typical** leader, (2) fairly **typical** symptoms

This artwork is **typical** of her work.

## overlap

*v.* to partially cover something by going beyond its edge

*synonym*: overlay, cover, bespread

(1) **overlap** one another, (2) **overlap** in many areas

There was no **overlap** between their proposals.

## recurrent

*adj.* occurring again, repeatedly, or frequently; returning  
*synonym* : continual, repeated, frequent

(1) **recurrent** problem, (2) **recurrent** miscarriage

The patient has been experiencing **recurrent** headaches for weeks.

## disadvantage

*n.* a drawback or a negative aspect of something; (verb) to put someone or something in an unfavorable position  
*synonym* : detriment, drawback, (verb) disfavor

(1) the **disadvantage** of a plan, (2) **disadvantage** small businesses

A lack of education can be a significant **disadvantage** in today's job market.

## weigh

*v.* to have a particular weight; to carefully evaluate things before making a conclusion  
*synonym* : consider, cogitate, count

(1) **weigh** heavily on stock prices, (2) **weigh** a cargo

The baby **weighs** 1 pound 3 oz.

## tradition

*n.* a belief, custom, or way of doing something that has been passed down from generation to generation within a group or society

*synonym* : custom, practice, ritual

(1) a **tradition** of a culture, (2) against **tradition**

It is a **tradition** in many families to have a big Thanksgiving dinner with all their relatives.

## meningioma

*n.* a type of tumor that develops in the meninges, the protective membranes that surround the brain and spinal cord, often slow-growing and benign but can cause symptoms and require medical treatment depending on location and size

*synonym* : brain tumor, meningeal tumors

(1) **meningioma** surgery, (2) **meningioma** treatment



Advanced imaging techniques can help with the diagnosis of **meningioma**.

### recurrence

*n.* the act of happening again or recurring; the return of something, such as a disease or symptom, after a period of abatement or remission

*synonym* : repetition, return, reappearance

(1) **recurrence** rate, (2) **recurrence** after chemotherapy

The **recurrence** of the flu every winter is a common occurrence.

### undergo

*v.* to go through something unpleasant or that involves a change

*synonym* : experience, suffer, endure

(1) **undergo** surgery, (2) **undergo** a decrease

The train has to **undergo** rigorous safety checks.

### recover

*v.* to return to a former condition, health, mind, or strength

*synonym* : come back, convalesce, heal

(1) **recover** a loss, (2) **recover** approval ratings

She is still **recovering** from a shot to her shoulder.

### concept

*n.* an idea or principle associated with something abstract

*synonym* : idea, notion, vision

(1) learn new **concepts**, (2) **concept** car

One such rapidly growing **concept** is quantum cryptography.

### lung

*n.* either of the two organs in the chest that people and some animals use for breathing

(1) **lung** capacity, (2) do **lung** transplantation

He has terminal **lung** cancer.

### liver

*n.* a large organ in the body, involved in many metabolic processes, such as detoxification of the organism, and the synthesis of proteins

(1) **liver** disease, (2) fatty **liver**

The patient will undergo **liver** transplant surgery tomorrow.

## pancreas

*n.* a glandular organ in the digestive system that produces several important hormones, including insulin and glucagon, as well as digestive enzymes that help break down food in the small intestine

*synonym* : gland, organ, islet

(1) **pancreas** inflammation, (2) **pancreas** function

The endocrine function of the **pancreas** involves the secretion of hormones such as insulin.

## experiment

*n.* the scientific test conducted to observe what happens and gain new knowledge

*synonym* : experimentation, investigation

(1) **experiment** design, (2) series of **experiments**

His **experiments** showed highly positive results.

## disease

*n.* a disorder or illness that affects the body or mind, often characterized by specific symptoms or abnormal functioning of organs or systems

*synonym* : illness, ailment, affliction

(1) **disease** prevention, (2) **disease** control

The doctor diagnosed him with a rare **disease** that had no known cure.

## epilepsy

*n.* a neurological disorder characterized by recurrent seizures or convulsions, which can manifest in a variety of ways and be caused by various factors

*synonym* : seizures, convulsions, fits

(1) **epilepsy** seizure, (2) **epilepsy** medication

The flashing lights at the concert triggered her **epilepsy** and caused a seizure.

## obsessive

*adj.* relating to or characterized by an obsession or excessive interest in a particular thing or activity; tending to dwell on or repeat certain thoughts or behaviors

*synonym* : compulsive, fixated, besetting

(1) **obsessive-compulsive** disorder, (2) **obsessive** thoughts

Her **obsessive** behavior towards perfectionism often led to burnout.

## compulsive

*adj.* relating to or involving an irresistible urge to do something repeatedly or excessively, often in a way that is harmful or detrimental to one's well-being or relationships

*synonym* : compelling, obsessive, uncontrollable

(1) **compulsive** gambling, (2) **compulsive** behavior

He had a **compulsive** need to check the stove was turned off every time he left the house.

## disorder

*n.* an untidy state or a lack of organization; a physical condition or illness that causes problems with how a section of the body or brain functions

*synonym* : chaos, disturbance, disease

(1) the files are in complete **disorder**, (2) people with bipolar **disorder**

The doctor prescribed some medicine for the mental **disorder**.

## diagnose

*v.* to determine or distinguish the nature of a problem or an illness through a careful analysis

*synonym* : identify, analyze, interpret

(1) **diagnose** the problem, (2) **diagnose** with CT scans

This device is used to **diagnose** brain cancer and other tumors.

## devastating

*adj.* causing a great deal of destruction or damage

*synonym* : destructive, annihilative, disastrous

(1) have **devastating** effects, (2) treat this **devastating** disease

This typhoon was the most **devastating** in years.

## advancement

*n.* the development, improvement, or progress of something

*synonym*: progression, breakthrough, improvement

(1) **advancement** of knowledge, (2) career **advancement**  
Competition between countries resulted in fast technological **advancement**.

## invasive

*adj.* spreading very quickly, and often aggressively, and difficult to stop

*synonym*: aggressive, rampant, spreading

(1) **invasive** breast cancer, (2) **invasive** species

The **invasive** disease can spread quickly and potentially cause a global pandemic.

## pave

*v.* to cover something with a hard, flat material such as stones, bricks, or concrete, to make it suitable for travel or use

*synonym*: surface, coat, cover

(1) **pave** a new path, (2) **pave** a smoother road

They **paved** the courtyard with bricks, giving it a more polished appearance.

## pathway

*n.* a track that constitutes or serves as a path; an approach or a way of doing something

*synonym*: route, footpath, trail

(1) **pathway** to understanding, (2) cellular signaling **pathways**

When the first molecule in the **pathway** receives a signal, it activates other molecules.

## gentle

*adj.* having or showing a kindly or tender nature; soft and mild

*synonym*: mild, delicate, soft

(1) in a **gentle** voice, (2) **gentle** downward slope

Her **gentle** manner relaxed everyone there.

## Session 2: Spelling

- |                                   |      |  |
|-----------------------------------|------|--|
| 1. co____ge from different points | v.   | to move or draw together at a specific location; (of lines) to move towards the same point where they join or meet   |
| 2. pa____as function              | n.   | a glandular organ in the digestive system that produces several important hormones, including insulin and glucagon, as well as digestive enzymes that help break down food in the small intestine  |
| 3. ind_____lly designed product   | adv. | separately or apart from others  |
| 4. fatty li__r                    | n.   | a large organ in the body, involved in many metabolic processes, such as detoxification of the organism, and the synthesis of proteins   |
| 5. the cell of the im___e system  | adj. | protected against a particular disease or toxin due to the presence of specific antibodies or sensitized white blood cells   |
| 6. ad____on of vectors            | n.   | the act or process of adding something to something else; the process of adding numbers  |
| 7. a m__s of molten rock          | n.   | a large amount of a substance with no definite shape or form; a large number of people or things grouped or crowded together   |
| 8. da___e a relationship          | v.   | to harm or cause injury to something or someone, often resulting in decreased value or functionality; to impair or negatively affect something, such as a reputation or relationship; (noun) harm or injury that is caused to a person, thing, or entity |

ANSWERS: 1. converge, 2. pancreas, 3. individually, 4. liver, 5. immune, 6. addition, 7. mass, 8. damage



17. ov\_\_\_\_p one another      *v.* to partially cover something by going beyond its edge
18. develop in\_\_\_\_e itching      *adj.* (especially of a feeling) very strong; extremely sharp or severe
19. in\_\_\_\_on tool      *n.* a sharp cut made in something with a sharp tool, especially during a medical procedure
20. effect of cosmic r\_ys      *n.* a narrow line of light, heat, or another form of energy
21. sc\_\_b dirt from potatoes      *v.* to clean something thoroughly, typically with a brush and soap or detergent
22. we\_\_h heavily on stock prices      *v.* to have a particular weight; to carefully evaluate things before making a conclusion
23. adv\_\_\_\_nt of knowledge      *n.* the development, improvement, or progress of something
24. a remote re\_\_\_\_ve      *adj.* considered and evaluated through comparison with something else
25. mentally un\_\_\_\_le      *adj.* lacking solidity, persistence, or firmness and therefore not strong, safe, or likely to continue; lacking control of one's emotions
26. severe cr\_\_\_\_c      *n.* someone who expresses opinions about the quality of books, music, etc.
27. pr\_\_\_\_te a rumor      *v.* to spread or promote something widely, particularly beliefs, ideas, or plants and animals through reproduction
28. basic br\_\_n function      *n.* the organ inside the head that is responsible for one's movement, thought, memory, and feeling

ANSWERS: 17. overlap, 18. intense, 19. incision, 20. ray, 21. scrub, 22. weigh, 23. advancement, 24. relative, 25. unstable, 26. critic, 27. propagate, 28. brain

29. sp\_\_\_\_\_ht moment *n.* a beam of light used to illuminate a particular area or person
30. the files are in complete di\_\_\_\_\_er *n.* an untidy state or a lack of organization; a physical condition or illness that causes problems with how a section of the body or brain functions
31. cr\_\_\_\_\_l information *adj.* extremely vital or necessary
32. sp\_\_\_\_\_ht effect *n.* a beam of light used to illuminate a particular area or person
33. ine\_\_\_\_\_le fate *adj.* impossible to avoid or evade
34. ha\_\_\_\_\_us material *adj.* involving risk or danger; unsafe or unhealthy
35. a cr\_\_\_\_\_l issue for women *adj.* extremely vital or necessary
36. take im\_\_\_\_\_te effect *adj.* happening or done without delay or occurring shortly after something else
37. people with bipolar di\_\_\_\_\_er *n.* an untidy state or a lack of organization; a physical condition or illness that causes problems with how a section of the body or brain functions
38. sp\_\_e cost *adj.* additional to what is necessary for ordinary use; (verb) to give time, money, space, etc. to someone
39. dis\_\_\_\_\_age small businesses *n.* a drawback or a negative aspect of something; (verb) to put someone or something in an unfavorable position
40. seed h\_\_k *n.* the dry, outer covering of a seed, grain, or fruit, such as the shell of a nut or the skin of a corn kernel

ANSWERS: 29. spotlight, 30. disorder, 31. crucial, 32. spotlight, 33. inescapable, 34. hazardous, 35. crucial, 36. immediate, 37. disorder, 38. spare, 39. disadvantage, 40. husk



41. com\_\_\_\_\_ve behavior *adj.* relating to or involving an irresistible urge to do something repeatedly or excessively, often in a way that is harmful or detrimental to one's well-being or relationships
42. career adv\_\_\_\_\_nt *n.* the development, improvement, or progress of something
43. co\_\_\_\_\_t car *n.* an idea or principle associated with something abstract
44. the me\_\_\_\_\_sm for DNA replication *n.* a part of a machine, or a set of parts that performs a task; a natural or established process that occurs during a specific situation or reaction
45. mental fle\_\_\_\_\_ty *n.* the quality of changing or being changed easily according to new conditions or situations
46. men\_\_\_\_\_ma treatment *n.* a type of tumor that develops in the meninges, the protective membranes that surround the brain and spinal cord, often slow-growing and benign but can cause symptoms and require medical treatment depending on location and size
47. in\_\_\_\_\_ve species *adj.* spreading very quickly, and often aggressively, and difficult to stop
48. co\_\_\_\_\_ge of a series *v.* to move or draw together at a specific location; (of lines) to move towards the same point where they join or meet
49. ca\_\_\_\_\_e connection *n.* a small waterfall or series of small waterfalls; a succession of stages or operations or processes or units

ANSWERS: 41. compulsive, 42. advancement, 43. concept, 44. mechanism, 45. flexibility, 46. meningioma, 47. invasive, 48. converge, 49. cascade



60. standard pr\_\_\_\_\_re *n.* a way of doing something, especially the official or well-known way
61. ad\_\_\_t a schedule *v.* to make a minor modification to something to make it more suited for a new set of conditions or to make it function better.
62. small in\_\_\_\_\_on *n.* a sharp cut made in something with a sharp tool, especially during a medical procedure
63. chemical ad\_\_\_\_\_on *n.* the act or process of adding something to something else; the process of adding numbers
64. the im\_\_\_\_\_te past *adj.* happening or done without delay or occurring shortly after something else
65. ste\_\_\_\_\_tic radiosurgery *adj.* relating to a precise, three-dimensional coordinate system used in medical procedures and diagnostic imaging, such as stereotactic surgery, which involves the use of a rigid head frame or a specialized device to target a specific area of the brain or other body part
66. railways in\_\_\_\_\_ct the country *v.* to meet or cross one another
67. ge\_\_\_e downward slope *adj.* having or showing a kindly or tender nature; soft and mild
68. di\_\_\_\_\_e control *n.* a disorder or illness that affects the body or mind, often characterized by specific symptoms or abnormal functioning of organs or systems
69. ob\_\_\_\_\_ve thoughts *adj.* relating to or characterized by an obsession or excessive interest in a particular thing or activity; tending to dwell on or repeat certain thoughts or behaviors

ANSWERS: 60. procedure, 61. adjust, 62. incision, 63. addition, 64. immediate, 65. stereotactic, 66. intersect, 67. gentle, 68. disease, 69. obsessive

70. do l\_\_g transplantation *n.* either of the two organs in the chest that people and some animals use for breathing
71. re\_\_\_\_ve factors *adj.* considered and evaluated through comparison with something else
72. in\_\_\_\_\_le stars *adj.* impossible or nearly impossible to see
73. st\_\_\_e up a conversation *v.* to wallop somebody or something with the hand, fist, or weapon; to have an emotional or cognitive impact upon
74. pr\_\_\_\_\_te plants *v.* to spread or promote something widely, particularly beliefs, ideas, or plants and animals through reproduction
75. in\_\_\_\_\_ct at a point *v.* to meet or cross one another
76. li\_\_r disease *n.* a large organ in the body, involved in many metabolic processes, such as detoxification of the organism, and the synthesis of proteins
77. a nervous br\_\_\_\_\_wn *n.* a failure or collapse of a system or organization
78. ca\_\_\_r diagnosis *n.* abnormal growth of cells that can invade and destroy surrounding tissues and organs; a disease characterized by the uncontrolled growth and spread of abnormal cells
79. as\_\_\_t his goal *v.* to help someone in doing anything
80. op\_\_\_\_\_ze a process *v.* to make the best or most effective use of something
81. charged pa\_\_\_\_\_le *n.* a small piece of something; a word or piece of a term with grammatical function but little or no significance

ANSWERS: 70. lung, 71. relative, 72. invisible, 73. strike, 74. propagate, 75. intersect, 76. liver, 77. breakdown, 78. cancer, 79. assist, 80. optimize, 81. particle

82. X-\_\_y scan *n.* a type of electromagnetic radiation that has a wavelength shorter than visible light allowing hidden objects such as bones and organs inside the body to be photographed
83. ma\_\_\_\_\_nt growth *adj.* having an evil or harmful nature or effect; cancerous, tending to invade or spread rapidly
84. rec\_\_\_\_\_ce after chemotherapy *n.* the act of happening again or recurring; the return of something, such as a disease or symptom, after a period of abatement or remission
85. ov\_\_\_\_\_p in many areas *v.* to partially cover something by going beyond its edge
86. un\_\_\_\_\_o a decrease *v.* to go through something unpleasant or that involves a change
87. sp\_\_e parts *adj.* additional to what is necessary for ordinary use; (verb) to give time, money, space, etc. to someone
88. l\_\_g capacity *n.* either of the two organs in the chest that people and some animals use for breathing
89. against tr\_\_\_\_\_on *n.* a belief, custom, or way of doing something that has been passed down from generation to generation within a group or society
90. exposure to ra\_\_\_\_\_on *n.* the energy that comes from a nuclear reaction in the form of rays, waves, or particles and that can be hazardous to health

ANSWERS: 82. X-ray, 83. malignant, 84. recurrence, 85. overlap, 86. undergo, 87. spare, 88. lung, 89. tradition, 90. radiation

91. cutting-edge inn\_\_\_\_\_on *n.* the creation of a new device or process resulting from study and experimentation
92. the crosswise di\_\_\_\_\_on *n.* a measurable extent of a particular kind, such as width, height, or length
93. treat this dev\_\_\_\_\_ng disease *adj.* causing a great deal of destruction or damage
94. the st\_\_\_\_\_re of a machine *n.* the way of construction of something and the arrangement of its parts, or a complex thing constructed of many parts
95. an in\_\_\_\_\_le asset *adj.* impossible or nearly impossible to see
96. population de\_\_\_\_\_y *n.* the quality of compactness of a substance
97. r\_v up the crowd *n.* a measure of the rate at which an engine or motor rotates, often expressed in revolutions per minute (RPM); (verb) to increase the number of rotations per minute
98. chaotic env\_\_\_\_\_nt *n.* the natural world such as air, water, and land in which humans, animals, and plants live
99. ha\_\_\_\_\_us conditions *adj.* involving risk or danger; unsafe or unhealthy
100. contractual co\_\_\_\_\_ge *n.* the reporting or news of an important event, sports, subject, etc.; the amount, range, area, or quality of something that something provides
101. re\_\_\_\_\_nt miscarriage *adj.* occurring again, repeatedly, or frequently; returning

ANSWERS: 91. innovation, 92. dimension, 93. devastating, 94. structure, 95. invisible, 96. density, 97. rev, 98. environment, 99. hazardous, 100. coverage, 101. recurrent

102. lo\_\_\_e a missing pet *v.* to specify or determine the exact position of someone or something
103. a ra\_\_\_\_\_l flaw in the plan *adj.* relating to the essential aspects of anything; far beyond the norm, mainly used of opinions and actions
104. harmonic re\_\_\_\_\_ce *n.* a deep, full, or reverberating sound or tone; a quality or feeling of a particular emotional or mental vibration or significance; a mutual or sympathetic connection or correspondence between two things
105. p\_\_\_e a smoother road *v.* to cover something with a hard, flat material such as stones, bricks, or concrete, to make it suitable for travel or use
106. inn\_\_\_\_\_on leader *n.* the creation of a new device or process resulting from study and experimentation
107. ob\_\_\_\_\_ve-compulsive disorder *adj.* relating to or characterized by an obsession or excessive interest in a particular thing or activity; tending to dwell on or repeat certain thoughts or behaviors
108. low-r\_v engine *n.* a measure of the rate at which an engine or motor rotates, often expressed in revolutions per minute (RPM); (verb) to increase the number of rotations per minute
109. cellular signaling pa\_\_\_\_\_ys *n.* a track that constitutes or serves as a path; an approach or a way of doing something

ANSWERS: 102. locate, 103. radical, 104. resonance, 105. pave, 106. innovation, 107. obsessive, 108. rev, 109. pathway

110. inh\_\_\_\_\_ble environment      *adj.* harsh and difficult to stay in or grow; unfriendly and unwelcoming towards people who visit you
111. lo\_\_\_e a tumor      *v.* to specify or determine the exact position of someone or something
112. a tr\_\_\_\_\_on of a culture      *n.* a belief, custom, or way of doing something that has been passed down from generation to generation within a group or society
113. un\_\_\_\_\_o surgery      *v.* to go through something unpleasant or that involves a change
114. defense me\_\_\_\_\_sm      *n.* a part of a machine, or a set of parts that performs a task; a natural or established process that occurs during a specific situation or reaction
115. ca\_\_\_r research      *n.* abnormal growth of cells that can invade and destroy surrounding tissues and organs; a disease characterized by the uncontrolled growth and spread of abnormal cells
116. br\_\_\_\_\_wn maintenance      *n.* a failure or collapse of a system or organization
117. sw\_\_p a room with a glance      *v.* to clean something, especially a floor or an area, by using a broom; move swiftly and smoothly
118. pa\_\_\_\_\_as inflammation      *n.* a glandular organ in the digestive system that produces several important hormones, including insulin and glucagon, as well as digestive enzymes that help break down food in the small intestine

ANSWERS: 110. inhospitable, 111. locate, 112. tradition, 113. undergo, 114. mechanism, 115. cancer, 116. breakdown, 117. sweep, 118. pancreas



119. in\_\_\_\_ve breast cancer *adj.* spreading very quickly, and often aggressively, and difficult to stop
120. ep\_\_\_\_sy medication *n.* a neurological disorder characterized by recurrent seizures or convulsions, which can manifest in a variety of ways and be caused by various factors
121. de\_\_\_\_y the ecosystem *v.* to ruin or damage severely or completely; to eradicate or eliminate completely
122. env\_\_\_\_nt affairs *n.* the natural world such as air, water, and land in which humans, animals, and plants live
123. sw\_\_p up dead leaves *v.* to clean something, especially a floor or an area, by using a broom; move swiftly and smoothly
124. de\_\_\_\_yed evidence *v.* to ruin or damage severely or completely; to eradicate or eliminate completely
125. un\_\_\_\_le weather *adj.* lacking solidity, persistence, or firmness and therefore not strong, safe, or likely to continue; lacking control of one's emotions
126. ind\_\_\_\_ly related *adv.* not going straight to the point; implying or suggesting something
127. fairly ty\_\_\_\_l symptoms *adj.* having the usual characteristics or traits of a specific group of things
128. a fence sur\_\_\_\_ng a castle *adj.* that is near or around, or closely encircling something
129. di\_\_\_\_se the problem *v.* to determine or distinguish the nature of a problem or an illness through a careful analysis

ANSWERS: 119. invasive, 120. epilepsy, 121. destroy, 122. environment, 123. sweep, 124. destroy, 125. unstable, 126. indirectly, 127. typical, 128. surrounding, 129. diagnose

130. we\_\_h a cargo *v.* to have a particular weight; to carefully evaluate things before making a conclusion
131. city and its vi\_\_\_\_ty *n.* the area or region surrounding or in the general vicinity of a particular place or location; a nearby or neighboring region
132. b\_\_m of light *n.* a long, sturdy piece of timber, metal, or other material used to support a structure or span a distance; a ray or stream of light emitted by a source
133. the blood fl\_\_h into my face *v.* to become red on your face, especially because you are embarrassed, angry, or hot; to rinse, clean, or empty something, especially a toilet, by causing large quantities of water to flow
134. in\_\_\_\_us device *adj.* showing inventiveness and ability or skill
135. e\_\_t a gamma ray *v.* to give off or send out something such as light, heat, sound, gas, etc.
136. learn new co\_\_\_\_ts *n.* an idea or principle associated with something abstract
137. exp\_\_\_\_nt design *n.* the scientific test conducted to observe what happens and gain new knowledge
138. fl\_\_h the toilet *v.* to become red on your face, especially because you are embarrassed, angry, or hot; to rinse, clean, or empty something, especially a toilet, by causing large quantities of water to flow
139. ep\_\_\_\_sy seizure *n.* a neurological disorder characterized by recurrent seizures or convulsions, which can manifest in a variety of ways and be caused by various factors

ANSWERS: 130. weigh, 131. vicinity, 132. beam, 133. flush, 134. ingenious, 135. emit, 136. concept, 137. experiment, 138. flush, 139. epilepsy

140. co\_\_\_\_\_e augmented reality      *v.* to join or merge to form a single thing or group
141. answer questions ind\_\_\_\_\_lly      *adv.* separately or apart from others
142. burn s\_\_r      *n.* a mark that remains on the skin after a wound has healed
143. permanent br\_\_n damage      *n.* the organ inside the head that is responsible for one's movement, thought, memory, and feeling
144. series of exp\_\_\_\_\_nts      *n.* the scientific test conducted to observe what happens and gain new knowledge
145. a structural b\_\_m of a building      *n.* a long, sturdy piece of timber, metal, or other material used to support a structure or span a distance; a ray or stream of light emitted by a source
146. ou\_\_\_\_\_ed the plan      *v.* to describe the main facts or aspects involved in something
147. electromagnetic ra\_\_\_\_\_on      *n.* the energy that comes from a nuclear reaction in the form of rays, waves, or particles and that can be hazardous to health
148. ind\_\_\_\_\_ly impact      *adv.* not going straight to the point; implying or suggesting something
149. sh\_\_r a hedge      *v.* to cut or trim with scissors or shears; to remove something by cutting or tearing it away from something else; to become severed or split apart by force acting parallel to the plane of a surface; (noun) a cutting tool used to trim or cut materials such as fabric, hair, or metal

ANSWERS: 140. combine, 141. individually, 142. scar, 143. brain, 144. experiment, 145. beam, 146. outline, 147. radiation, 148. indirectly, 149. shear

150. re\_\_\_\_r approval ratings      *v.* to return to a former condition, health, mind, or strength
151. sh\_\_r force      *v.* to cut or trim with scissors or shears; to remove something by cutting or tearing it away from something else; to become severed or split apart by force acting parallel to the plane of a surface; (noun) a cutting tool used to trim or cut materials such as fabric, hair, or metal
152. tu\_\_r growth      *n.* a mass of diseased tissue that forms when cells in the body divide and grow in an uncontrolled way
153. ess\_\_\_\_ly correct      *adv.* relating to the essential features or concepts of anything
154. pa\_\_\_\_y to understanding      *n.* a track that constitutes or serves as a path; an approach or a way of doing something
155. become ess\_\_\_\_ly same      *adv.* relating to the essential features or concepts of anything
156. da\_\_\_e assessment      *v.* to harm or cause injury to something or someone, often resulting in decreased value or functionality; to impair or negatively affect something, such as a reputation or relationship; (noun) harm or injury that is caused to a person, thing, or entity
157. the professor of su\_\_\_\_y      *n.* medical treatment of injuries or diseases involving an incision with instruments and often removing or replacing some parts of the body; the branch of medical science that treats disease or injury by operative procedures

ANSWERS: 150. recover, 151. shear, 152. tumor, 153. essentially, 154. pathway, 155. essentially, 156. damage, 157. surgery

158. ca\_\_\_\_\_te the distance      *v.* to judge or find out the amount or number of something by using mathematics
159. in\_\_\_\_\_us idea      *adj.* showing inventiveness and ability or skill
160. im\_\_\_e from criminal prosecution      *adj.* protected against a particular disease or toxin due to the presence of specific antibodies or sensitized white blood cells
161. st\_\_\_e a blow      *v.* to wallop somebody or something with the hand, fist, or weapon; to have an emotional or cognitive impact upon
162. h\_\_k removal      *n.* the dry, outer covering of a seed, grain, or fruit, such as the shell of a nut or the skin of a corn kernel
163. as\_\_\_t a patient      *v.* to help someone in doing anything
164. have dev\_\_\_\_\_ng effects      *adj.* causing a great deal of destruction or damage
165. art cr\_\_\_c      *n.* someone who expresses opinions about the quality of books, music, etc.
166. ou\_\_\_\_\_e the findings      *v.* to describe the main facts or aspects involved in something
167. e\_\_t air pollution      *v.* to give off or send out something such as light, heat, sound, gas, etc.
168. the fle\_\_\_\_\_ty of the body      *n.* the quality of changing or being changed easily according to new conditions or situations
169. a facial ti\_\_\_e      *n.* an ensemble of similar cells of the animal or plant that together carry out a specific function

ANSWERS: 158. calculate, 159. ingenious, 160. immune, 161. strike, 162. husk, 163. assist, 164. devastating, 165. critic, 166. outline, 167. emit, 168. flexibility, 169. tissue

170. higher pixel de\_\_\_\_\_y  
*n.* the quality of compactness of a substance
171. pr\_\_\_\_\_e analyses  
*adj.* sharply exact or accurate or delimited
172. carry a s\_\_r  
*n.* a mark that remains on the skin after a wound has healed
173. in\_\_\_\_\_e heat  
*adj.* (especially of a feeling) very strong; extremely sharp or severe
174. a gr\_\_\_\_\_l change  
*adj.* happening slowly over a long period of time or distance; not steep or abrupt
175. ste\_\_\_\_\_tic biopsy  
*adj.* relating to a precise, three-dimensional coordinate system used in medical procedures and diagnostic imaging, such as stereotactic surgery, which involves the use of a rigid head frame or a specialized device to target a specific area of the brain or other body part
176. ma\_\_\_\_\_ic field  
*adj.* having the properties of attracting or repelling certain materials containing iron or steel
177. ca\_\_\_\_\_te his credit score  
*v.* to judge or find out the amount or number of something by using mathematics
178. pr\_\_\_\_\_s improvement  
*n.* a series of actions or operations performed to achieve a particular outcome or goal; a systematic procedure or approach used to accomplish a specific task or objective; a method of treating milk to make it suitable for consumption or use in other dairy products

ANSWERS: 170. density, 171. precise, 172. scar, 173. intense, 174. gradual, 175. stereotactic, 176. magnetic, 177. calculate, 178. process

179. tr\_\_\_\_\_rm heat into power      *v.*    to change in outward structure or looks;
180. decision-making pr\_\_\_\_\_s      *n.*    a series of actions or operations performed to achieve a particular outcome or goal; a systematic procedure or approach used to accomplish a specific task or objective; a method of treating milk to make it suitable for consumption or use in other dairy products
181. co\_\_\_\_\_e chemically with another substance      *v.*    to join or merge to form a single thing or group
182. sc\_\_b off graffiti      *v.*    to clean something thoroughly, typically with a brush and soap or detergent
183. p\_\_e a new path      *v.*    to cover something with a hard, flat material such as stones, bricks, or concrete, to make it suitable for travel or use
184. precision sc\_\_\_\_\_l      *n.*    a small, sharp knife or blade used in surgery or dissection for cutting tissue or separating parts of the body
185. pa\_\_\_\_\_le energy      *n.*    a small piece of something; a word or piece of a term with grammatical function but little or no significance
186. surgical sc\_\_\_\_\_l      *n.*    a small, sharp knife or blade used in surgery or dissection for cutting tissue or separating parts of the body
187. the dis\_\_\_\_\_age of a plan      *n.*    a drawback or a negative aspect of something; (verb) to put someone or something in an unfavorable position

ANSWERS: 179. transform, 180. process, 181. combine, 182. scrub, 183. pave, 184. scalpel, 185. particle, 186. scalpel, 187. disadvantage

188. immediate vi\_\_\_\_\_ty *n.* the area or region surrounding or in the general vicinity of a particular place or location; a nearby or neighboring region
189. ad\_\_\_\_t the rearview mirror *v.* to make a minor modification to something to make it more suited for a new set of conditions or to make it function better.
190. critical m\_\_\_\_s *n.* a large amount of a substance with no definite shape or form; a large number of people or things grouped or crowded together
191. a gr\_\_\_\_\_l process *adj.* happening slowly over a long period of time or distance; not steep or abrupt
192. imm\_\_\_\_\_ly recall a product *adv.* now or without delay
193. tr\_\_\_\_\_m an education system *v.* to change in outward structure or looks;
194. estimate pr\_\_\_\_\_e costs *adj.* sharply exact or accurate or delimited
195. opaque to X-r\_ys *n.* a narrow line of light, heat, or another form of energy
196. di\_\_\_\_\_se with CT scans *v.* to determine or distinguish the nature of a problem or an illness through a careful analysis
197. undergo a surgical pr\_\_\_\_\_re *n.* a way of doing something, especially the official or well-known way
198. an ine\_\_\_\_\_le position *adj.* impossible to avoid or evade
199. ty\_\_\_\_\_l leader *adj.* having the usual characteristics or traits of a specific group of things
200. op\_\_\_\_\_ze control for cooling *v.* to make the best or most effective use of something

ANSWERS: 188. vicinity, 189. adjust, 190. mass, 191. gradual, 192. immediately, 193. transform, 194. precise, 195. ray, 196. diagnose, 197. procedure, 198. inescapable, 199. typical, 200. optimize



201. a ra\_\_\_\_\_l cure *adj.* relating to the essential aspects of anything; far beyond the norm, mainly used of opinions and actions
202. ma\_\_\_\_\_nt tumor *adj.* having an evil or harmful nature or effect; cancerous, tending to invade or spread rapidly
203. rec\_\_\_\_\_ce rate *n.* the act of happening again or recurring; the return of something, such as a disease or symptom, after a period of abatement or remission
204. in a ge\_\_\_\_e voice *adj.* having or showing a kindly or tender nature; soft and mild
205. men\_\_\_\_\_ma surgery *n.* a type of tumor that develops in the meninges, the protective membranes that surround the brain and spinal cord, often slow-growing and benign but can cause symptoms and require medical treatment depending on location and size
206. st\_\_\_\_\_re and function of the brain *n.* the way of construction of something and the arrangement of its parts, or a complex thing constructed of many parts

ANSWERS: 201. radical, 202. malignant, 203. recurrence, 204. gentle, 205. meningioma, 206. structure

## Session 3: Fill in the Blanks

1. He has terminal \_\_\_\_\_ cancer.
  - n.* either of the two organs in the chest that people and some animals use for breathing
  
2. The company is working hard to \_\_\_\_\_ their brand message to as many people as possible
  - v.* to spread or promote something widely, particularly beliefs, ideas, or plants and animals through reproduction
  
3. The \_\_\_\_\_ chemicals must be handled with extreme care to avoid any accidents.
  - adj.* involving risk or danger; unsafe or unhealthy
  
4. The politician tried to \_\_\_\_\_ the embarrassing incident under the rug.
  - v.* to clean something, especially a floor or an area, by using a broom; move swiftly and smoothly
  
5. Hydrogen and oxygen \_\_\_\_\_ to form water.
  - v.* to join or merge to form a single thing or group
  
6. She decided to \_\_\_\_\_ the kitchen floor to remove all the dirt and grime.
  - v.* to clean something thoroughly, typically with a brush and soap or detergent
  
7. The baby \_\_\_\_\_ 1 pound 3 oz.
  - v.* to have a particular weight; to carefully evaluate things before making a conclusion

ANSWERS: 1. lung, 2. propagate, 3. hazardous, 4. sweep, 5. combine, 6. scrub, 7. weighs

8. Most countries prohibit sexual activity between certain close \_\_\_\_\_.  
*adj.* considered and evaluated through comparison with something else
9. Patients undergoing \_\_\_\_\_ surgery are often put to sleep by anesthesia.  
*n.* a sharp cut made in something with a sharp tool, especially during a medical procedure
10. This page \_\_\_\_\_ our response planning for an emergency.  
*v.* to describe the main facts or aspects involved in something
11. It is a \_\_\_\_\_ in many families to have a big Thanksgiving dinner with all their relatives.  
*n.* a belief, custom, or way of doing something that has been passed down from generation to generation within a group or society
12. The \_\_\_\_\_ of the flu every winter is a common occurrence.  
*n.* the act of happening again or recurring; the return of something, such as a disease or symptom, after a period of abatement or remission
13. The country experienced a \_\_\_\_\_ increase in population.  
*adj.* happening slowly over a long period of time or distance; not steep or abrupt
14. He trekked across some of the most \_\_\_\_\_ mountains in the world.  
*adj.* harsh and difficult to stay in or grow; unfriendly and unwelcoming towards people who visit you
15. He stepped on the gas pedal, and the engine released a loud \_\_\_\_\_.  
*n.* a measure of the rate at which an engine or motor rotates, often expressed in revolutions per minute (RPM); (verb) to increase the number of rotations per minute

ANSWERS: 8. relatives, 9. incisional, 10. outlines, 11. tradition, 12. recurrence, 13. gradual, 14. inhospitable, 15. rev

16. When the first molecule in the \_\_\_\_\_ receives a signal, it activates other molecules.

*n.* a track that constitutes or serves as a path; an approach or a way of doing something

17. The phenomenon is \_\_\_\_\_ at optical wavelengths.

*adj.* impossible or nearly impossible to see

18. In \_\_\_\_\_ private corporations provide healthcare services.

*n.* the act or process of adding something to something else; the process of adding numbers

19. The \_\_\_\_\_ force of the earth keeps our planet spinning.

*adj.* having the properties of attracting or repelling certain materials containing iron or steel

20. The government established by the coup was more \_\_\_\_\_ than before.

*adj.* relating to the essential aspects of anything; far beyond the norm, mainly used of opinions and actions

21. Lead is an effective \_\_\_\_\_ against X-rays, gamma rays, and other harmful radiation.

*n.* a protective covering or structure, especially in the past, that soldiers held in front of their bodies to protect themselves

22. The doctor diagnosed him with a rare \_\_\_\_\_ that had no known cure.

*n.* a disorder or illness that affects the body or mind, often characterized by specific symptoms or abnormal functioning of organs or systems

23. Both forts were subject to \_\_\_\_\_ attacks.

*adj.* happening or done without delay or occurring shortly after something else

ANSWERS: 16. pathway, 17. invisible, 18. addition, 19. magnetic, 20. radical, 21. shield, 22. disease, 23. immediate

24. The area in the \_\_\_\_\_ of the mall is known for its heavy traffic congestion.  
*n.* the area or region surrounding or in the general vicinity of a particular place or location; a nearby or neighboring region
25. Even after the wound has healed, a \_\_\_\_\_ remains.  
*n.* a mark that remains on the skin after a wound has healed
26. Her multidisciplinary works \_\_\_\_\_ music and picture with writing.  
*v.* to meet or cross one another
27. The two rivers \_\_\_\_\_ into one near this area.  
*v.* to move or draw together at a specific location; (of lines) to move towards the same point where they join or meet
28. The robot can accurately \_\_\_\_\_ construction material.  
*v.* to specify or determine the exact position of someone or something
29. Her \_\_\_\_\_ manner relaxed everyone there.  
*adj.* having or showing a kindly or tender nature; soft and mild
30. He had a \_\_\_\_\_ need to check the stove was turned off every time he left the house.  
*adj.* relating to or involving an irresistible urge to do something repeatedly or excessively, often in a way that is harmful or detrimental to one's well-being or relationships
31. Advanced imaging techniques can help with the diagnosis of \_\_\_\_\_.  
*n.* a type of tumor that develops in the meninges, the protective membranes that surround the brain and spinal cord, often slow-growing and benign but can cause symptoms and require medical treatment depending on location and size

ANSWERS: 24. vicinity, 25. scar, 26. intersect, 27. converge, 28. locate, 29. gentle, 30. compulsive, 31. meningioma

32. The doctor ordered an \_\_\_\_\_ to see if there was any damage to the bones.  
*n.* a type of electromagnetic radiation that has a wavelength shorter than visible light allowing hidden objects such as bones and organs inside the body to be photographed
33. Competition between countries resulted in fast technological \_\_\_\_\_.  
*n.* the development, improvement, or progress of something
34. That statement by the prime minister drew \_\_\_\_\_ international criticism.  
*adj.* (especially of a feeling) very strong; extremely sharp or severe
35. The surgeon used an electric \_\_\_\_\_ to make a precise incision during the operation.  
*n.* a small, sharp knife or blade used in surgery or dissection for cutting tissue or separating parts of the body
36. The \_\_\_\_\_ disease can spread quickly and potentially cause a global pandemic.  
*adj.* spreading very quickly, and often aggressively, and difficult to stop
37. The flashing lights at the concert triggered her \_\_\_\_\_ and caused a seizure.  
*n.* a neurological disorder characterized by recurrent seizures or convulsions, which can manifest in a variety of ways and be caused by various factors
38. He tried every possible treatment, including chemotherapy and \_\_\_\_\_ therapy.  
*n.* the energy that comes from a nuclear reaction in the form of rays, waves, or particles and that can be hazardous to health
39. Overall \_\_\_\_\_ are approximately 400x200mm.  
*n.* a measurable extent of a particular kind, such as width, height, or length

ANSWERS: 32. X-ray, 33. advancement, 34. intense, 35. scalpel, 36. invasive, 37. epilepsy, 38. radiation, 39. dimensions

40. The patient will undergo \_\_\_\_\_ transplant surgery tomorrow.  
*n.* a large organ in the body, involved in many metabolic processes, such as detoxification of the organism, and the synthesis of proteins
41. The researcher separated the nervous \_\_\_\_\_ for microscopic examinations.  
*n.* an ensemble of similar cells of the animal or plant that together carry out a specific function
42. X-rays revealed a small tumor in his \_\_\_\_\_.  
*n.* the organ inside the head that is responsible for one's movement, thought, memory, and feeling
43. His \_\_\_\_\_ showed highly positive results.  
*n.* the scientific test conducted to observe what happens and gain new knowledge
44. The endocrine function of the \_\_\_\_\_ involves the secretion of hormones such as insulin.  
*n.* a glandular organ in the digestive system that produces several important hormones, including insulin and glucagon, as well as digestive enzymes that help break down food in the small intestine
45. The patient has been experiencing \_\_\_\_\_ headaches for weeks.  
*adj.* occurring again, repeatedly, or frequently; returning
46. A suspension order from the court is effective \_\_\_\_\_.  
*adv.* now or without delay
47. We can calculate the position of the \_\_\_\_\_ statistically.  
*n.* a small piece of something; a word or piece of a term with grammatical function but little or no significance

ANSWERS: 40. liver, 41. tissue, 42. brain, 43. experiments, 44. pancreas, 45. recurrent, 46. immediately, 47. particles

48. The \_\_\_\_\_ mountains make the city difficult to be invaded.

*adj.* that is near or around, or closely encircling something

49. He had undergone heart \_\_\_\_\_ years before.

*n.* medical treatment of injuries or diseases involving an incision with instruments and often removing or replacing some parts of the body; the branch of medical science that treats disease or injury by operative procedures

50. The train has to \_\_\_\_\_ rigorous safety checks.

*v.* to go through something unpleasant or that involves a change

51. The consequences of his actions were \_\_\_\_\_ and he had to face the consequences.

*adj.* impossible to avoid or evade

52. We dealt with those problems with speed and \_\_\_\_\_.

*n.* the quality of changing or being changed easily according to new conditions or situations

53. He couldn't \_\_\_\_\_ the actual value of the artwork.

*v.* to judge or find out the amount or number of something by using mathematics

54. The \_\_\_\_\_ of people who do not own property is politically impotent.

*n.* a large amount of a substance with no definite shape or form; a large number of people or things grouped or crowded together

55. The vaccination does not necessarily make you completely \_\_\_\_\_.

*adj.* protected against a particular disease or toxin due to the presence of specific antibodies or sensitized white blood cells

ANSWERS: 48. surrounding, 49. surgery, 50. undergo, 51. inescapable, 52. flexibility, 53. calculate, 54. mass, 55. immune



56. Gamma \_\_\_\_\_ penetrate body tissues and cause cell damage.  
*n.* a narrow line of light, heat, or another form of energy
57. A lack of education can be a significant \_\_\_\_\_ in today's job market.  
*n.* a drawback or a negative aspect of something; (verb) to put someone or something in an unfavorable position
58. This artwork is \_\_\_\_\_ of her work.  
*adj.* having the usual characteristics or traits of a specific group of things
59. The organizational \_\_\_\_\_ of start-ups is often flat and straightforward.  
*n.* the way of construction of something and the arrangement of its parts, or a complex thing constructed of many parts
60. She is still \_\_\_\_\_ from a shot to her shoulder.  
*v.* to return to a former condition, health, mind, or strength
61. The building was \_\_\_\_\_ in the fire and had to be rebuilt.  
*v.* to ruin or damage severely or completely; to eradicate or eliminate completely
62. The doctors found \_\_\_\_\_ cells in the patient's biopsy, indicating a severe illness.  
*adj.* having an evil or harmful nature or effect; cancerous, tending to invade or spread rapidly
63. Advocates for legal reform hear less harsh words from their \_\_\_\_\_.  
*n.* someone who expresses opinions about the quality of books, music, etc.
64. The content is \_\_\_\_\_ and informative for me.  
*adj.* sharply exact or accurate or delimited

ANSWERS: 56. rays, 57. disadvantage, 58. typical, 59. structure, 60. recovering, 61. destroyed, 62. malignant, 63. critics, 64. precise

65. I need to \_\_\_\_\_ the wool off of the sheep before winter.

- v.* to cut or trim with scissors or shears; to remove something by cutting or tearing it away from something else; to become severed or split apart by force acting parallel to the plane of a surface; (noun) a cutting tool used to trim or cut materials such as fabric, hair, or metal

66. One such rapidly growing \_\_\_\_\_ is quantum cryptography.

- n.* an idea or principle associated with something abstract

67. The singer's voice filled the auditorium with beautiful \_\_\_\_\_.

- n.* a deep, full, or reverberating sound or tone; a quality or feeling of a particular emotional or mental vibration or significance; a mutual or sympathetic connection or correspondence between two things

68. The essence of economics is to \_\_\_\_\_ the allocation of limited resources.

- v.* to make the best or most effective use of something

69. They \_\_\_\_\_ the courtyard with bricks, giving it a more polished appearance.

- v.* to cover something with a hard, flat material such as stones, bricks, or concrete, to make it suitable for travel or use

70. The revitalization of technology companies is \_\_\_\_\_ to the country's growth.

- adj.* extremely vital or necessary

71. The scandal received widespread media \_\_\_\_\_.

- n.* the reporting or news of an important event, sports, subject, etc.; the amount, range, area, or quality of something that something provides

72. Please \_\_\_\_\_ her with the furniture relocation.

- v.* to help someone in doing anything

ANSWERS: 65. shear, 66. concept, 67. resonance, 68. optimize, 69. paved, 70. crucial, 71. coverage, 72. assist

73. \_\_\_\_\_ a society is an organism.

*adv.* relating to the essential features or concepts of anything

74. The surgeon used a \_\_\_\_\_ device to target the tumor during the procedure precisely.

*adj.* relating to a precise, three-dimensional coordinate system used in medical procedures and diagnostic imaging, such as stereotactic surgery, which involves the use of a rigid head frame or a specialized device to target a specific area of the brain or other body part

75. This typhoon was the most \_\_\_\_\_ in years.

*adj.* causing a great deal of destruction or damage

76. The \_\_\_\_\_ for applying for a visa can be lengthy and complicated.

*n.* a series of actions or operations performed to achieve a particular outcome or goal; a systematic procedure or approach used to accomplish a specific task or objective; a method of treating milk to make it suitable for consumption or use in other dairy products

77. Her \_\_\_\_\_ behavior towards perfectionism often led to burnout.

*adj.* relating to or characterized by an obsession or excessive interest in a particular thing or activity; tending to dwell on or repeat certain thoughts or behaviors

78. The sun's \_\_\_\_\_ shone through the window and illuminated the room.

*n.* a long, sturdy piece of timber, metal, or other material used to support a structure or span a distance; a ray or stream of light emitted by a source

79. This device is used to \_\_\_\_\_ brain cancer and other tumors.

*v.* to determine or distinguish the nature of a problem or an illness through a careful analysis

ANSWERS: 73. Essentially, 74. stereotactic, 75. devastating, 76. process, 77. obsessive, 78. beam, 79. diagnose

80. I always look forward to reading his stories since they're so \_\_\_\_\_.

*adj.* showing inventiveness and ability or skill

81. During the surgery, the doctor had to be extremely cautious not to \_\_\_\_\_ a blood vessel.

*v.* to harm or cause injury to something or someone, often resulting in decreased value or functionality; to impair or negatively affect something, such as a reputation or relationship; (noun) harm or injury that is caused to a person, thing, or entity

82. Breast \_\_\_\_\_ is the most common type of cancer in women.

*n.* abnormal growth of cells that can invade and destroy surrounding tissues and organs; a disease characterized by the uncontrolled growth and spread of abnormal cells

83. The tower proved to be \_\_\_\_\_ in the high wind.

*adj.* lacking solidity, persistence, or firmness and therefore not strong, safe, or likely to continue; lacking control of one's emotions

84. Every human is responsible for taking care of the Earth's \_\_\_\_\_.

*n.* the natural world such as air, water, and land in which humans, animals, and plants live

85. You have to \_\_\_\_\_ your content to the age of the audience.

*v.* to make a minor modification to something to make it more suited for a new set of conditions or to make it function better.

86. We \_\_\_\_\_ to achieve more wages and safer working conditions.

*v.* to wallop somebody or something with the hand, fist, or weapon; to have an emotional or cognitive impact upon

ANSWERS: 80. ingenious, 81. damage, 82. cancer, 83. unstable, 84. environment, 85. adjust, 86. strike

87. The CEO \_\_\_\_\_ expressed her disappointment with the project's progress.  
*adv.* not going straight to the point; implying or suggesting something
88. The doctor prescribed some medicine for the mental \_\_\_\_\_.  
*n.* an untidy state or a lack of organization; a physical condition or illness that causes problems with how a section of the body or brain functions
89. The patient was diagnosed with a \_\_\_\_\_ in her lung.  
*n.* a mass of diseased tissue that forms when cells in the body divide and grow in an uncontrolled way
90. There was no \_\_\_\_\_ between their proposals.  
*v.* to partially cover something by going beyond its edge
91. The singer was in the \_\_\_\_\_ as she performed her hit song.  
*n.* a beam of light used to illuminate a particular area or person
92. The \_\_\_\_\_ of the machinery caused a delay in production.  
*n.* a failure or collapse of a system or organization
93. The pilot and flight attendant ran through the check-out \_\_\_\_\_.  
*n.* a way of doing something, especially the official or well-known way
94. Do you know the \_\_\_\_\_ of the population in Hong Kong?  
*n.* the quality of compactness of a substance
95. He discovered unique \_\_\_\_\_ for photochemical reactions.  
*n.* a part of a machine, or a set of parts that performs a task; a natural or established process that occurs during a specific situation or reaction

ANSWERS: 87. indirectly, 88. disorder, 89. tumor, 90. overlap, 91. spotlight, 92. breakdown, 93. procedure, 94. density, 95. mechanisms

96. My father's death \_\_\_\_\_ my life completely.

*v.* to change in outward structure or looks;

97. The girl \_\_\_\_\_ when a young man whistled as she walked by.

*v.* to become red on your face, especially because you are embarrassed, angry, or hot; to rinse, clean, or empty something, especially a toilet, by causing large quantities of water to flow

98. The \_\_\_\_\_ of the coconut was removed to reveal the fruit inside.

*n.* the dry, outer covering of a seed, grain, or fruit, such as the shell of a nut or the skin of a corn kernel

99. The vegetarian burger was an \_\_\_\_\_ that quickly spread to the United Kingdom.

*n.* the creation of a new device or process resulting from study and experimentation

100. Each department has done its product costing \_\_\_\_\_.

*adv.* separately or apart from others

101. The \_\_\_\_\_ of waterfalls in the national park was a breathtaking sight.

*n.* a small waterfall or series of small waterfalls; a succession of stages or operations or processes or units

102. During the unloading, the container box \_\_\_\_\_ a clicking sound.

*v.* to give off or send out something such as light, heat, sound, gas, etc.

103. I made plans to spend my \_\_\_\_\_ time beneficially.

*adj.* additional to what is necessary for ordinary use; (verb) to give time, money, space, etc. to someone

ANSWERS: 96. transformed, 97. flushed, 98. husk, 99. innovation, 100. individually, 101. cascade, 102. emits, 103. spare

ANSWERS: