

12. Insurance 2: Life Planning with Life Insurance

Introduction

Once you understand the basics of insurance, your understanding of the importance of life insurance increases greatly. Much of what is written on the subject of life insurance is confusing and difficult to grasp. The purpose of this chapter is to help you to more clearly understand the benefits and costs of the different types of life insurance.

Objectives

When you have completed this chapter, you should be able to do the following:

- A. Understand the benefits of life insurance and the five key questions.
- B. Understand the different types of term life insurance.
- C. Understand the different types of permanent life insurance.
- D. Determine which type of insurance is best for you and know the steps to buying life insurance.
- E. Understand plans and strategies for life insurance.

Understand the Benefits of Life Insurance and the Five Key Questions

Life insurance provides your beneficiaries compensation in the event of your death. Death is a low-frequency (you can only die once) but high-severity risk. Life insurance is essentially contingent financing: it will help support your family in the event of your death. The financial loss due to death is significant. Life insurance can help us take care of our nuclear and extended families financially even beyond death.

Life insurance contracts are designed to help consumers achieve a variety of individual and family goals. Life insurance marketing may be confusing, and recommendations and policy language differ from company to company. It is critical to understand the benefits of life insurance so you can make wise choices regarding it.

Benefits of Life Insurance

The greatest benefit of life insurance is insuring your beneficiaries against the economic loss caused by death. While the payments can never replace the person lost, they can replace his or her ability to pay for living expenses, home mortgages and taxes, education expenses, and other costs. At a critical time, the payments may make it possible for the surviving spouse to remain in the home and concentrate on raising the surviving children. However, life insurance offers four

additional benefits that may be of interest to you as you develop your Personal Financial Plan: life insurance can benefit you with estate planning, insurability, retirement planning, and saving.

Life insurance proceeds may be used in estate planning to ensure that sufficient funds are available to pay estate settlement costs after death (debts, taxes, legal costs, burial expenses, etc.). Proceeds may help heirs receive as large a share of inheritance assets as legally possible. In addition, proceeds can be used to ensure that inheritance assets, such as businesses, do not have to be sold at discounted prices to raise funds for estate taxes or other liabilities.

Permanent life insurance products offer guaranteed insurability. Once you have a contract with the insurance company, your insurance contract cannot be canceled unless you fail to make payments. Once you have this contract, regardless of your medical condition, you cannot be denied the life insurance agreed upon.

Life insurance may also be used for retirement planning. When retirement income is taken from the cash value of an insurance policy, it can be received on a tax-favored basis. The cash-value portion of life insurance, after mortality costs and fees, may gain interest or capital gains that are exempt from taxes. This extra interest or capital gains may be saved for retirement. Life insurance also allows you to borrow against the cash-value portion of your policy and, in essence, receive a low-cost loan. Moreover, when you borrow against the cash-value portion of your policy, you don't have to sell the permanent assets as you would with a normal investment account (resulting in capital gains or losses). Instead, the insurance company actually makes a loan to you against the cash-value portion of the policy.

Finally, life insurance can be a type of forced savings account. For those without the discipline to make monthly payments into a savings or investment program, life insurance can be a part of an overall savings strategy. The individual can purchase certain types of permanent life insurance products with low fees and mortality expenses, and can direct, to a degree, where the investment portion of the monthly premiums are invested. When needed, the individual can borrow against the cash value of the policy for a tax-free loan.

Remember, insurance is never your best investment, and investment is never your best insurance. The goal is to use insurance for what it does best and investment for what it does best. Be careful when combining the two.

Five Key Questions about Life Insurance

You should understand the following important terms as you learn about life insurance:

Beneficiary: The recipient of benefits in the event of the death of the insured.

Cash value: The total account value that is available to the policy owner while he or she is alive. Most policies have both guaranteed and non-guaranteed elements of the cash value. This means that some elements, such as a minimum return each year, may be

guaranteed, and other elements, such as may vary with the instrument in which the cash value is invested, may not be guaranteed. The cash value is reduced by any loans or applicable surrender charges.

Face value: The basic benefit the insurance company is to pay the beneficiaries; the face value is due upon the death of the insured. Total benefits may be higher if there have been policy additions.

Insured: The person whose life is covered by the insurance policy.

Policy owner: The individual or business that pays for and owns the insurance policy.

Premium: The payment for an insurance policy. Premiums can be paid monthly, quarterly, semiannually, or annually. Premiums may build cash value in certain insurance products; this cash value may be used to pay costs.

There are five important questions you should ask yourself about life insurance:

1. Why Should You Have Life Insurance?

Life insurance provides financial compensation to your beneficiaries in the event of your death. This type of insurance can help you prepare for major catastrophes and accidents; life insurance also yields some living benefits, or benefits that are available before death. Paul wrote, “But if any provide not for his own, and especially for those of his own house, he hath denied the faith, and is worse than an infidel.”¹ Having adequate life insurance can help us fulfill this commandment even after we die.

2. How Does Life Insurance Work?

Life insurance is an example of risk pooling, which means that individuals transfer or share their financial risks with others to reduce potential catastrophic losses due to death, accidents, or health problems. While everyone pays into this insurance pool, because there are several participants and hopefully few recipients, the cost per participant is small because expenses are shared among the large number of participants.

There are two main risks that life insurance can share or transfer: mortality risk and investment risk. Mortality risk is the risk that the insured dies outside of the contract period and is therefore not covered by insurance. Some insurance contracts must be renewed each year and are therefore very risky because health problems or other concerns may make an individual unable to obtain coverage. Other products cannot be canceled by the insurance company (except in the case of nonpayment by the policy owner) and therefore ensure mortality coverage.

Investment risk has to do with who takes responsibility for the investment outcome; with some policies it is the individual who takes responsibility and with others it is the insurance company.

3. Who Needs Life Insurance?

Any individual whose death would create financial hardship for his or her dependents or business should have life insurance. This includes the following types of individuals:

- Single or married parents with children or other dependents.
- Married, single-income couples where the nonworking spouse has insufficient work skills or savings to survive should the breadwinner die.
- Business owners who want the value of their businesses to be passed on to their heirs or who want to preserve the value of their businesses if a key person is lost.
- Those whose estates exceed the tax-free transfer threshold for estates or who need additional liquidity at the time of death to avoid discount sales of estate assets.

While life insurance may offer benefits for other people in addition to those listed above, those benefits are not necessary for every individual.

4. How Much Life Insurance Is Necessary?

The decision regarding how much life insurance you need should be made individually. An earlier edition of the *Handbook for Families* recommends,

Insure the family's breadwinner first, then others, if desired, as income permits. At a minimum, get enough life insurance to pay for such things as a funeral, taxes, mortgage on the home, car payments, and other debts. The next priority should be to get enough insurance that, supplemented by any government retirement benefits the surviving spouse may be entitled to, there will be sufficient to provide for the family and to make provisions for the children's education and missions.²

I like the framework that recommends minimum insurance first, then additional priorities. There are two different methods of determining how much life insurance you need: the earnings multiple approach and the needs approach.

With the **earnings multiple approach** the goal of having life insurance is earnings replacement. This approach has the goal of replacing the annual salary stream of a breadwinner for a certain number of years, or until the children are raised and the surviving spouse is financially stable and retired. Normally, an amount of 5 to 15 times your gross salary is recommended. Generally, most insurance companies will not insure an individual for more than 20 times his or her annual income. There is a three-step process for using the earnings multiple approach:

1. *Adjust the pre-incident salary down to compensate for the reduction in household expenses.* Generally, a family's expenses decline in a predictable manner in the event of the death of an adult family member. The larger the family size, the less the percentage of total family expenses will drop (see Table 1).
2. *Choose the appropriate interest rate to match the assumed after-tax and after-inflation*

earnings on a policy settlement. Interest rates affect insurance policies in that the higher the market interest rates, the more can be earned on investments, including money paid by an insurance company. If you think future market interest rates will be higher, your beneficiaries will not need as large an insurance settlement as would be necessary if market interest rates were lower.

Table 1. Percent Reduction in Living Expenses for Families

Family members after death	Reduction in living expenses
1	30%
2	26%
3	22%
4	20%
5	18%

To get an idea of how interest rates and the amount needed each year are related, see Table 2. If you needed \$50,000 at the beginning of each year for the next 40 years and market interest rates were five percent, you would need to invest \$857,954 in an annuity which would give you that \$50,000 each year. If market interest rates were three percent, you would need to invest over \$1 million in life insurance proceeds. Clearly, interest rates have an impact on insurance needs.

Table 2. Amount Needed for a \$50,000 Annual Annuity

Years in Retirement	3%	4%	5%	6%
40	\$1,155,739	\$989,639	\$857,954	\$752,315
30	\$980,022	\$864,602	\$768,623	\$688,242
20	\$743,874	\$679,516	\$623,111	\$573,496
10	\$426,510	\$405,545	\$386,087	\$368,004

This table shows the amounts you need to invest to obtain a \$50,000 annual payment or annuity for the following years in retirement at the indicated market interest rates.

Once life insurance proceeds are paid to the beneficiaries, the proceeds should be invested with the goal of providing a specific amount of money each year, or an annuity, to meet the beneficiaries' needs and expenses. Additionally, an annuity could be purchased or an annuity settlement option in the policy elected, which would guarantee a specific payment each period for a specific number of periods. Investing these funds will ensure that funds are available to pay expenses in a timely manner.

3. Determine the income stream replacement and annuity. The income stream replacement is how much money the beneficiaries will need each period or year and how long they will need that income stream. Once you have determined how much you need each period and for how

long, you can calculate the amount of money needed to provide the required income stream.

The **needs approach** for determining the amount of life insurance needed has a different goal from that of the earnings multiple approach. The goal is to meet the total financial needs of the household after the death of a breadwinner, both at the time of death and in the future. To calculate the necessary amount of life insurance according to this approach, add up all of your funding needs to determine the total needs of your beneficiaries. Include immediate needs, debt elimination, transitional funds, dependency funds, spousal life income funds, spousal education funds, children's education funds, and retirement income funds. Subtract current insurance coverage and other available assets from this total. There is a four-step process for calculating the needs approach:

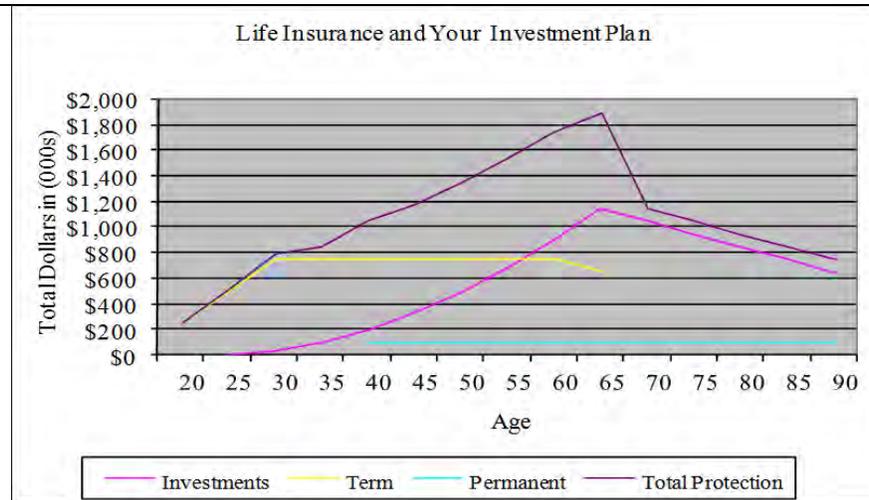
1. *Add up all funding needs.* This inventory of funding needs is a very detailed description of the total needs of the family. The total needs of the beneficiaries include the following: immediate needs, such as needs for a funeral and other expenses; debt elimination needs, such as paying off credit card debts and mortgages; transitional needs, which include helping the spouse gain needed skills for better employment if necessary; dependency needs, such as taking care of and educating children; spousal life income needs, such as taking care of the spouse so he or she does not have to work; and education and retirement needs, such as taking care of the surviving spouse in retirement.
2. *Subtract current insurance coverage and other available assets.* The result gives you the amount of additional coverage you will need.
3. *Determine the income stream that would be needed to meet the family needs, and then calculate the amount of money required to provide the needed annuity* (see Figure 2). The difference between your total needs and your current coverage and available assets determines the amount of additional insurance coverage that will be necessary to meet the needs of dependents in the event that the breadwinner dies. Some couples find it essential to have two breadwinners, in which case couples should consider having life insurance for both spouses.

If your goal for having life insurance is income replacement, recognize that your income needs will change over time. Depending on your salary, the size of your family, and the growth of your investment assets, the amount of income that will need to be replaced varies throughout your life: it will increase significantly as children are born and raised and then decline as your children finish college. Therefore, instead of using a single product to meet all of your needs, it may be advantageous for you to utilize multiple products to give you maximum protection at the most cost-effective rate. These products should take into account your goals, budget, and growth in investment assets (see Chart 4).

Finally, you must determine the type of insurance you need. There are two main types of life insurance: term, or insurance for a specific period, and permanent (also known as endowment or cash-value insurance), which is term insurance with a savings component. The type of insurance

you choose will depend on four factors: your priorities and preferences, the amount of insurance needed, your ability and willingness to pay premiums, and the duration of need.

Chart 4. Life Insurance and Your Investment Plan



Permanent: with guaranteed insurability option paid up till age 65. Term: Five-year guaranteed renewable term in \$50,000 and \$100,000 increments; can add and drop as necessary. Investment: Includes individual and employer sponsored retirement plans

5. What Type of Life Insurance?

Your priorities and preferences refer to your goals and objectives. What do you want the life insurance product to do? What are your personal goals? Your preferences are what you generally like to do. Do you prefer to “own” or “lease”? What are your “biases” for insurance? Are you willing to take the risk of re-insurability or not?

The amount of insurance needed is also an important consideration. Buy term insurance when there is no way to satisfy the financial needs should you die without it. The term protection may be converted to another form of protection at a later date, if available (i.e., convertible term). Buy a combination of term and permanent when you can cover the financial needs should you die and when you are able and willing to allocate additional dollars to appropriate permanent coverage.

Your ability and willingness to pay premiums should also be considered. Pay on installment basis (term, or low-outlay whole life) if your mortality risk is higher than average. Prepay coverage if you expect to live longer than average (vanishing premium or limited-payment whole life) or if you want payments to stop at a specific age. Purchase a yearly renewable term if you want minimal payments initially that increase year to year. Consider permanent coverage if your cash flows are sufficient to cover the higher premiums and you are committed to paying for it for the rest of your life.

The duration of need is your final consideration. Buy a term policy if your need is 10 to 30 years. If the need will last longer than 20 years, buy a permanent policy or a guaranteed renewable term

policy with your required duration (of 10, 20, or even 40 years). Finally, you should buy a permanent policy if the coverage will be continued beyond age 55 or if the policy will be used for estate taxes and charitable giving.

Understand the Types of Term Life Insurance

How Term Insurance Works

Term insurance provides life insurance protection that is valid over a specific term or time period. After the specified period of time is over, the life insurance company is not required to continue coverage. The main advantage of this type of insurance is that it is the least expensive coverage over the short term, since insurance costs rise with age. However, this type of insurance may be disadvantageous because it is valid only if the insured dies during the term of coverage. Another disadvantage is that the cost of the insurance will increase with each new contract period because term insurance is basically the pure cost of mortality insurance at a specific age. Older individuals typically pay more for life insurance because the probability of death increases with age. The insurance contract might not be renewed once the current term expires (at the insurance company’s discretion) unless it contains a guaranteed renewable feature.

Figure 4. Term Life Insurance Characteristics

Term Insurance Characteristics					
Type of Policy	Description	Mortality Risk	Policy Cost	Payouts Based on	Biggest Risks
Annual Renewable Term*	Lowest cost term policy with premiums increasing each year aligned with probability of dying; however you must re-qualify and re-apply each year for the policy	Must be renewed each year so risk is high, but policies may be in force well into retirement years	Lowest cost term insurance initially, then costs rise exponentially as probability of dying increases	Payouts based on guarantees	Insured is unable to qualify for renewal and cannot get new insurance. Costs may become prohibitive in later years
Level Term Option*	Lower cost term policy with option for a level price each year of the period	May be renewed for multiple years at the same price so lower risk	Lower cost term insurance	Payouts based on guarantees	Insured is unable to qualify for renewal and cannot get new insurance.
* Convertible Rider (included with most policies above)	Insured can convert to a permanent if within a certain number of years or before a certain age	As term, higher risk; but as permanent, risk is lowest as cannot be declined if premiums paid	Most term policies include some form of convertible rider. Check policies for details	Payouts based on guarantees	Insured does not convert within the conversion period and cannot get new insurance

Figure 4 shows term life insurance characteristics for the different types of term policies. Premium payments are made that cover mortality costs and other fees. There is no buildup of cash—all premiums go to pay the costs and fees. As long as you continue making payments, you are covered for the contracted amount of time.

There are many different types of term insurance, the most common being annual term, renewable term, and convertible term.

Annual term. With annual term insurance, the face or death benefit amount is constant throughout the selected term of coverage. Premiums increase each time the contract is renewed,

even though the face amount remains the same. Coverage terminates after the specified time period.

Renewable term. Renewable term insurance policies can be renewed for a specific number of years. Even if health problems become apparent after coverage has begun, you can continue the coverage until the end of the specified period. Premiums will increase considerably at each renewal period, unless you demonstrate to the company that your health and circumstances merit a continued favorable rate.

Convertible term. Convertible term insurance is a policy that can be exchanged for a permanent policy within a specific number of years after issuance, without evidence of insurability. Many term policies contain this specific guarantee. These convertible term insurance policies allow you to convert your term policy to a permanent one at your discretion, regardless of your medical history; you also do not have to get a medical exam to convert your policy.

Premiums on term policies are much lower than on permanent policies with similar death benefits for three main reasons. First, with term policies, you are only paying for insurance for a specific period, which means that the risk is priced one period at a time. Roughly 98 percent of all term policies lapse without payment. Second, term insurance is generally priced for shorter time periods, from one to 20 years. The longer the time period, the higher the fees the insurance companies must charge in the early years to offset the more expensive mortality charges and fees in the later years. Finally, term insurance policies are less complex than permanent products and are cheaper and easier to administer.

There are a number of important questions that should be answered before you purchase term insurance. These questions include the following:

- What is the premium?
- How long can I keep this policy?
- What are the renewal terms of the contract?
- When will my premiums increase?
- Can I convert my term policy to a permanent policy?
- Can I convert it without getting a medical exam? What are the details?
- How strong is the insurance company financially?

Understand the Types of Permanent Life Insurance

Permanent life insurance is a contract in which the premiums are divided between death protection and savings. A portion of the premium pays for the mortality or death benefit component, and a portion goes toward paying the insurance fees. The remainder of the premium is put into an account that earns tax-deferred interest, dividends, or investment gains. Permanent insurance is often called endowment or cash-value insurance. This type of insurance is intended to provide the policy holder benefits over a lifetime. However, the policy will not be permanent if it does not have enough cash value, if the insured is not able to keep paying the premiums, or if

the investment value declines substantially.

Although permanent insurance is permanent under most circumstances, it is still possible to lose money with certain types of these products. The length of time in which payments must be made is sometimes a factor in permanent life insurance policies. You should determine if you can or want to pay premiums for the required length of time before you enter into a contract. If you do not wish to pay premiums throughout your entire life, fewer payment periods with fewer benefits can be arranged, or you may have an option of paying higher premiums over fewer payment periods.

How Permanent Insurance Works

There are three sources of cash that increase the value of a permanent life insurance policy. The first source is the premium payments you make on a regular basis. The second is the investment yield (also known as the dividend or investment earnings) from the cash-value portion of the policy. The third source of cash is available only on policies that allow you the option of receiving tax-free dividends from the insurance company as a legal return of premium. Dividends that exceed the premium are taxable, however. You can typically receive tax-free dividends on your insurance if you own insurance from a mutual company. This is because you own part of the company and receive a dividend as an inflow to your account each year based on your ownership of the company's earnings. However, should insurance company profits decline, these dividends are likely to decline as well. If your insurance policy comes from a stock company, then you have no ownership; however, the credits and costs of your policy will still be affected by the company's performance.

Permanent insurance cannot be canceled and therefore can be maintained for as long as you live. It provides a death benefit similar to that of term insurance as well as an opportunity to accumulate tax-deferred savings, which can be used for retirement and estate planning. Also, as the cash value of the insurance policy accumulates, it becomes a valuable asset that can be borrowed against—enabling you to get a loan that is very inexpensive and possibly tax-free. If you fail to pay back the loan, the face value of your policy is decreased by the value of the loan at payment to your beneficiaries.

Because permanent insurance is designed to maintain a constant premium throughout your life and to build cash value, the premium is naturally higher. To put this concept in perspective, the premium for a permanent policy may be 5 to 10 times higher than the premium on the same amount of term insurance; the premium is much higher because a portion of your premium goes toward creating cash value. Unless you maintain the policy by continuing to pay insurance premiums to cover costs and build cash value, the policy can expire, and you may lose much of what you have already put into the policy. With some of the newer products, like variable life insurance, your investments could *potentially lose money*, which would likely increase the amount of money you would have to contribute each year. Also, depending on the type of permanent insurance you have, there *may not be a guaranteed return* each year.

Expenses are another important aspect of buying a life insurance policy. Expenses can be divided into two categories. The first type of expense is the mortality cost, or the cost of the insurance. The second type of expense is the fees that accompany the purchasing process. These fees include sales commissions (often substantial), state insurance costs, deferred acquisition taxes, administrative fees, and investment fees (if applicable). These costs vary depending on the type of contract you have, so you should ask your agent to disclose these issues to you during the decision-making process. For a representation of the process of understanding permanent insurance, see Figure 5.

After you have paid the premiums on your permanent insurance for many years, the investment yield and dividends on your insurance may be sufficient to fund the policy (after expenses); when this happens, you will no longer need to continue paying the premiums. However, there is a risk that you will have to continue paying the premiums depending on the type of account, the investments chosen, and the economic environment.

Types of Permanent Insurance

There are a number of different types of permanent life insurance products, and these products differ according to five investment criteria: mortality risk, investment risk, policy costs, investment choice (i.e., assets), and investment flexibility. For a comparison of various term and permanent life insurance policies, see Tables 7 and 8.

Mortality risk refers to the risk that the insured dies within the contract period and is covered by insurance.

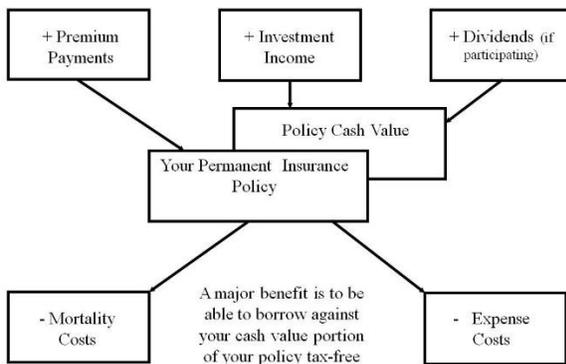
Investment risk refers to who takes responsibility for the investment outcome.

Policy cost compares the costs of the policy to other life insurance products.

Investment choice refers to the types of vehicles or assets the insured chooses to use to build his or her tax-deferred savings.

Policy flexibility refers to the degree of flexibility the insured has regarding insurance products—for example, account options, flexibility to change the face amount or death benefit over time, and flexibility to change premium payments depending on the insured's current situation. In the following chart, account flexibility, premium flexibility, and face value flexibility refer to the flexibility to change the investments, premium payment amounts, and face amount during the life of the contract (see Table 7).

It is important to understand why you want permanent life insurance. Understand your needs. Understand the individual policies of competing life insurance companies, such as the charges and deductions of the insurance company and the fees and expenses of the mutual funds or assets invested in. Finally, select the policy that gives you maximum benefit at the lowest possible cost to you.

Figure 5. Your Permanent Insurance Policy

Whole life. Whole life insurance gives lifelong coverage; this type of insurance has a fixed premium based on your age at the time of purchase. It is also called “straight life” or “ordinary life.” Although the risk of death increases with age, most insurance companies keep the premium and face amount of an insurance policy constant by charging more in the early years of your policy and less in the later years of your policy than you would be charged for term insurance. Whole life insurance is ideal for those who want and can afford permanent life insurance protection with a savings element. Mortality risk and investment risk are both eliminated with this product. This type of insurance provides a transition from income replacement goals to goals regarding retirement and estate planning. This type of insurance may also be attractive for those who have low self-discipline or low tolerance for risk in saving and investing.

Other advantages of whole life insurance include a fixed death benefit, a growing cash value, and potential growth from tax-deferred dividends. The disadvantages include the fact that it requires a much higher premium for the same amount of coverage. Moreover, the yield on the cash value portion of whole life insurance may not be competitive with yields on alternative investments because whole-life policies are generally invested in an insurance company’s long-term bonds and mortgages.

Universal life. Universal life insurance is a type of permanent life insurance that is a mix between term insurance and savings. Mortality risk is eliminated. This type of insurance earns interest at current money market or bond rates, so when interest rates are high, this type of policy will typically earn a better return. Thus, investment risk, while not eliminated, is low. This type of insurance also has a guaranteed minimum interest rate that is set for the life of the insured. The policy deducts a monthly fee for insurance coverage: the fee includes the mortality cost and the cost of managing the policy. Contributed funds that do not go toward paying for mortality insurance and costs earn tax-deferred interest.

In a universal life policy, the premium and face amounts are flexible. You can pay premiums in excess of costs in order to build cash value that is subject to federal tax limits. You can change the face amount of the policy and the amount and frequency of premium payments. Universal life insurance is ideal for those who want a flexible policy that combines term protection and tax-

deferred savings; this type of insurance is also appropriate for those who have sufficient knowledge of financial matters and are somewhat flexible and self-directed.

An advantage of universal life insurance is that it provides permanent protection that is similar to that of whole life insurance, and it has flexible premiums and death benefits. The cash value earns tax-deferred interest and can be borrowed against if the need should arise. One disadvantage is that universal life insurance typically requires a much higher premium than term life insurance requires for the same amount of coverage. Also, the cash value of the policy fluctuates depending on the amount paid into the policy and the current market interest rates. The cash value can quickly be depleted by insurance charges if sufficient premiums are not paid. The newest form of universal life insurance is similar to whole life insurance in that it guarantees payment for the full face amount of the policy in exchange for a fixed premium.

Variable life. Variable life insurance allows you to direct the investment portion of your premium into one or more separate investment accounts (such as stocks, bonds, or money market accounts). For this reason, investment risk for this type of product is substantial. Depending on company policy, you can change where the investment portion of your premium will go two to five times per year. While this type of policy gives added flexibility of investment, it is also risky because you, rather than the insurance company, decide where your money is invested; therefore, you assume the risk of the cash-value component. Variable life insurance often costs more in the long run than other types of permanent life insurance because of the added expenses and risks. This type of insurance is appropriate for those who want to take risks, manage their own investments, and have an opportunity (but no guarantee) for tax-deferred growth. If you need a tax shelter and are an experienced, risk-tolerant investor, variable life insurance may be a viable option.

Variable life insurance has the advantages of permanent protection and potential for building cash value. Returns are earned on a tax-deferred basis, and variable life insurance allows for either a fixed (straight variable) or flexible (variable universal) premium. Because you determine where the cash value will be invested, there is a potential for higher returns; these returns reflect the performance of the separate investment accounts. However, variable life insurance has the disadvantage of generally having higher costs. Premiums for variable life insurance are much higher than premiums for term life insurance and other permanent products with the same amount of coverage. This type of investment is also riskier than others because your investment can lose money, and, as in all permanent products, policies may lapse if you don't make payments.

Variable universal life. Variable universal life insurance combines the flexible features of universal life insurance with the investment options (and risks) of variable life insurance. You choose where to invest your premiums, and you assume all the investment risks associated with your choice, as with variable life insurance. Investment risk with this type of permanent insurance is substantial. You can raise or lower your premiums in a single policy, as with universal life insurance. The insurance company makes no guarantee on your cash value.

When you change investment vehicles, no capital gains are acquired, and any investment gains are tax-deferred. You have great flexibility regarding the frequency and amount of premium payments, and you are able to make partial withdrawals in the form of loans. If you furnish proof of insurability, you can increase or reduce the amount of coverage. Variable universal life insurance may be the best life insurance option for you if you need a tax shelter and if you are comfortable with high-risk/high-reward investing.

Table 8. Permanent Insurance Policies

Permanent Insurance Characteristics*								
Type of Policy	Description	Mortality Risk	Policy Cost	Payouts Based on	Biggest Risks	Policy Flexibility (for Permanent Insurance Only):		
						Investment	Premium	Face Amount
Whole Life	Lowest fixed cost permanent policy with premiums and payouts based on guarantees	Low as the policy will remain in force for life based on fixed premiums	Lowest cost permanent, but much higher than term	Payouts based on guarantees	Higher fixed premiums and conservative returns on guaranteed insurance instruments may limit upside	No ability to change, managed by general account of the insurance company	Fixed with no ability to change premiums	Generally no ability to change contract face value
Universal Life	Lower cost flexible permanent policy with cash value invested in short-term and money market investments	Low as the policy will remain in force as long as premiums are paid	Lower cost permanent, but more expensive than Whole Life	Payouts based on assumptions ONLY	Improper funding or very conservative money market returns may require additional contributions	No ability to change, can invest only in short-term fixed money market investments	Maximum ability to change premiums	Options to add cash value to the face amount for the total death benefit
Variable Universal Life	Higher cost flexible permanent policy with cash value invested in stocks, bonds, money market, etc. at insured's discretion	Low as the policy will remain in force as long as premiums are paid	Higher costs as there is more flexibility in investments	Payouts based on assumptions ONLY	Expensive and risk remains that low subaccount returns may require additional contributions making it prohibitively expensive	Maximum ability to change, between stocks, bonds, money market etc.	Maximum ability to change premiums	Options to add cash value to the face amount for the total death benefit
Equity Indexed Universal Life	Highest cost flexible permanent policy with cash value appreciation tied to a stock market index with no return downside but capped upside the company can change	Low as the policy will remain in force as long as premiums are paid	Highest costs and expenses which gives limited upside	Payouts based on assumptions ONLY	Very expensive and low stock market caps (which company can change after signing) and high fees offer limited market upside of 3-6% after fees	Choice among a few different investment indices with caps	Maximum ability to change premiums	Options to add cash value to the face amount for the total death benefit
Column Descriptions:	Key points of the policy most relevant to consumers	The risk that the insured dies outside the contract period and is not covered by the policy	The cost of the policy in relation to other life policies, both term and permanent	What the payout amounts are based on. If assumptions, the insured's risk is much greater	The insured's key risks of the chosen insurance policy	The insured's ability to change the investments during the life of the contract	The insured's ability to modify the premium payments for certain periods and ranges	The insured's ability to change the face amount of the policy within the contract period

Note: * With permanent products, if insurance company profits are insufficient, they can change the contract after signing to increase profits. ** These are general comments and may not apply in every situation.

The advantages of variable universal life insurance include permanent protection, returns that are earned on a tax-deferred basis, the choice of either a fixed premium (straight variable) or flexible (variable universal) premium, and the potential for higher returns on your cash value (based on the mutual fund's performance). This type of insurance also gives you the ability to choose different types of investments and to change investment vehicles free of charge a certain number of times per year. The disadvantages include higher costs—variable universal premiums are higher than premiums for term insurance for the same coverage. This type of insurance is also much riskier because your investments can lose money.

Equity indexed universal. Equity indexed universal life insurance combines the flexible features of universal life insurance with the investment options (and risks) of an equity index mutual fund (without dividends) which offers a capped exposure to the major equity markets for the cash value portion of the policy. By using this product, you assume all the investment risks associated with options on the major equity market and index mutual funds. The major selling point of this product is you gain the capped upside of the equity markets should markets advance, and none of the downside risk of a negative equity return.

The advantages are they offer capped upside exposure to the equity markets, without the risk of losing principle should the equity markets decline below zero return which sounds attractive. The downside is the huge commissions on these products—the fee structure is very high. There are caps on returns from the equity markets that limit your upside, usually to 4–8% per year maximum. Finally, because of the high fees on these products, unless they are aggressively funded, the cash value is often insufficient to keep the policy in force later in life due to the very high fees.

Permanent Insurance Cautions

Students who are looking at permanent insurance need to ask themselves several important questions:

Can I commit to the premiums over the long-term? Many students have no prospective job opportunities and will likely be in school for many more years. With permanent insurance, you are committing to make payments, regardless of whether you are in school and whether you have a job. Can you really commit to these payments now?

Do I need the tax benefits now? Once you get out of school, purchasing term insurance and investing the remainder (the difference between what you would have paid with a permanent product and what you pay with the term product) in a Roth IRA or 401(k) may be cheaper and better for you in the long run because you will not have to pay high insurance charges and you can therefore invest more for retirement. Qualified savings plans and retirement plans do not provide life insurance, but you may still want to consider putting your investment dollars into these plans before you get the more expensive life insurance products.

Are the rates of return on these insurance products guaranteed? Except for whole life, the answer is no. The rates they give on amounts they will pay are assumptions. In addition, be aware that the insurance companies can change the contracts after you have signed them, changing terms, conditions, and amounts paid if they are not making enough profit. Because of this, be careful of people who are selling products they do not understand. Because the commissions on these products are very high, some people may be selling products they don't understand to clients who don't need them.

Do I have a history of medical problems that would preclude my ability to get life insurance? If this is the case, you might want to look into permanent insurance.

For most students, “buy term and invest the rest” is an appropriate insurance strategy. Most students would do well to buy a term policy that is level term for 10 to 30 years with a convertibility option to permanent insurance and take the additional money they might have spent for permanent insurance and invest that in either a Roth or traditional IRA or a qualified retirement plan.

There is a place for permanent insurance for some individuals. However, think about this:

Commissions: If permanent insurance is such a good product, why pay such high commissions for sales? First year commissions to agents can be 50-120% of first year sales, often with recurring commissions for each year the policy is in place.

Annual Sub-account fees/expenses: Why must fees be so high on investment sub-accounts? These investments are not complex products, and are often just index funds. Why are the fees on these products so high compared to products not offered by insurance companies?

Assumptions: Why can the company change the insurance contracts even after the product is sold? In addition, payments on cash value products (except whole life) are based on assumptions which the company can change any time even after the contract is sold.

Transparency: Why is anecdotal return evidence so poor, which shows that 20 year returns on permanent products have generally been only slightly above inflation? Why is performance data so very difficult to find for these products?

Typical Expenses for a Permanent Life Insurance Policy

While permanent insurance has many benefits, it also has many more charges and deductions than term life insurance. This is because permanent contracts are designed to meet very specialized goals and needs. Because it would be impossible to describe every possible variation in detail, I will highlight a few of the main expenses of a variable universal life insurance policy (the most complex and flexible policy with the highest premium) as an example. These expenses may include the following:

Investment Account–Level Fees

Sales charges or front-end load: These are deductions for salesman distribution expenses. These charges can consume anywhere from zero to 10 percent of new money or premiums invested in the policy.

State premium taxes: These taxes vary by state and range from zero percent in Oregon to five percent in the Virgin Islands.³

Deferred acquisition (DAC) taxes: The DAC tax is a corporate federal income tax that is imposed on insurance companies. Previously, insurance companies wrote off all their acquisition expenses in the first year, thereby reducing taxable income. Now companies must spread out these acquisition expenses over the life of the acquisitions. This means that income is generated in the early years and income taxes are incurred. These taxes on the insurance companies are passed on to the insured.

First-year expenses: First-year administration fees include the cost of setting up the policy.

Monthly administrative fees: These fees enable the insurance company to provide services such as mailing confirmation notices and providing periodic reports.

Mortality and expense charges: These fees compensate the insurance company for certain mortality and expense risks and can range from 0.4 to 1.3 percent annually.

Sub-Account Fees

Sub-account fees are fees paid to the managers of the mutual funds in which the cash value of life insurance policies are invested. These fees include management and 12b-1 fees.

Investment management fees: These are charged for the overall management of the investment accounts, or in other words, the fees paid for professional management. These fees are taken daily from the underlying net assets or value of the sub-accounts.

12b-1 fees: These are used to pay financial advisors and brokerage firms for marketing the account's funds.

Overall expense ratio: This ratio finds the combined cost of all the asset-based charges discussed in this chapter. This is an important number that can be used to compare the costs of managing your money both inside and outside of a life insurance contract.

Figure 6. Charges for Permanent Insurance

Account-level expenses:	Minimum	Average	Maximum
Sales charges	0.0%	8.0%	10.0%
State premium taxes	0.75%	2.0%	5.0%
DAC tax	0.0%	1.5%	2.0%
First-year expense	\$200	\$350	\$700
Administration fees/month	\$4	\$6	\$15
Policy loans as % contract surrender value,			
Interest spread	75%, 4%	90%, 2%	100%, 0%
Asset charges			
Mortality and expense	0.4%	0.7%	1.3%
Sub-account fees			
Investment management	0.4%	0.8%	2.8%
12b-1 fees	0.0%	0.0%	0.5%
Overall expense ratio	1.0%	1.5%	4.4%
Other charges			
Surrender charges (these can be significant)			

Other Fees

Policy loans: A major benefit of permanent insurance is the ability to borrow money against the contract's surrender value (the value the policy would have if you decided to take the cash rather than the death benefit). If you die before the policy loan is paid back, the beneficiary of the loan will receive the face value of the contract minus what is still owed.

Surrender charges: Surrender charges, back-end loads, and contingent deferred sales charges refer to the amount of the policy's account value that you forfeit if you cancel or terminate your policy within a specified period. These fees reimburse the insurance company for expenses that have not yet been recovered. Surrender charges can be significant.

Other fees: There are a number of other fees and expenses that should also be taken into account. These include partial withdrawal processing fees, which are assessed for taking money out of the insurance policy; transfer charges, which are assessed for making asset transfers that are over the limit specified in your policy; and other charges that may be assessed for additional annual reports, increases in principal sums, additional riders, and so on. Not all companies assess all of these charges; be sure that all charges are disclosed when you are in the process of deciding what type of insurance to purchase.

When the charges, fees, and expenses are totaled, it is not uncommon for the total to be between 5 and 15 percent of every dollar you put into permanent insurance. Because of this, the cash-value portion of this type of insurance will grow more slowly than the cash value of a less expensive term policy. However, the term life policy requires you to pay income taxes (capital gains taxes) each year on your investment returns, which can reduce the advantage of a term life policy.

Permanent insurance is not for everyone. It is a very complex financial instrument and will help only those who need the specific benefits of this type of insurance. By understanding your needs and the different aspects of competing life insurance company policies—the charges, deductions, fees, and expenses of the invested assets—you can select a policy that will give you the maximum benefit at the lowest possible cost.

The following are some important questions to ask yourself about permanent insurance before you decide to invest:

- Are the premiums within my budget? Are the costs reasonable?
- Can I commit to these premiums on a long-term basis?
- On a variable life policy, what is the assumed interest rate in the example, or illustration, given you by the insurance agent?
- Is the classification shown in the illustration appropriate for me (i.e., smoker/nonsmoker, male/female)?
- Which figures are guaranteed and which are not?
- Will I be notified if the non-guaranteed amounts change?
- Is the death benefit guaranteed?

- Will the premiums always be the same, even if interest rates are lower than in the illustration?
- Is the illustrated premium sufficient to guarantee protection for my entire life?
- Is the “current rate” illustrated actually the rate paid recently? What was the current rate in each of the last five years?
- What assumptions have been used regarding company expenses, dividends, and policy lapse rates?
- Does all my cash value earn the current rate?
- Is the illustration based on the “cash surrender value” or “cash value”? (The cash surrender value is usually lower and reflects what will be paid if the policy is canceled.)

Understand Which Type of Life Insurance is Best for You

Determining which type of life insurance is right for you can be a challenge. For most people, especially students, convertible renewable term life insurance, which can be converted to a permanent policy without a new medical exam and is renewable for up to 30 years, is the cheapest and best alternative. If your goal is income replacement, term insurance is relatively inexpensive and has the most affordable coverage when life insurance is needed the most; it is possible to carry the coverage only for the amount of time insurance is needed. Although term life insurance becomes more expensive with age, it may become less necessary as your other assets, such as your investment portfolio, grow, so your dependents would need fewer benefits from life insurance in the event of your death. However, if taxes or other liabilities are due at death or if one desires to leave an estate, insurance may still be necessary.

Permanent insurance may be the best choice if you meet very specific criteria. If your goal is medical insurability (that is, if you have a history of medical problems and you already have convertible term insurance), you can't be denied life insurance should you decide to convert policies.

If the value of your assets is very great and you plan to leave an estate, and if you have estate-planning issues (i.e., you need to shield some of your assets), you should consider permanent insurance.

If your goal is retirement savings and you have already invested substantial amounts of money in your tax-deferred retirement accounts and have already invested the maximum in your tax-deferred accounts and annuities, you may want additional tax-deferred savings; consider permanent insurance as an additional investment vehicle.

If you are still unsure about what type of insurance is best for you, consider a renewable convertible term policy. This type of insurance provides the low cost of term insurance while giving you the ability to convert to a cash policy in the future (within a specific number of years).

Steps to Buying Life Insurance

Selecting an insurance agent is your responsibility—choose wisely. You are not just buying insurance: you are building an insurance structure that will shelter you and your dependents for many years. Following are some important tips for buying insurance:

1. Understand what you want. Understand yourself, your goals, and your budget. Consider how much insurance you need versus how much insurance you want. What kind of insurance policy will best meet your needs given your current family situation and cash flow? How much money do you want to spend? Do you have any pre-existing health conditions? Do you need the insurance for your whole life, or only for a specific period? Can you accept the significantly higher costs of permanent policies?

2. Compare the costs of competing policies. Do your homework and shop around, not just based on price but also based on benefits, coverage, and exclusions. Some possible ways of comparing policies are listed as follows:

- What are the annual premiums versus the amount of the coverage?
- Is the policy renewable, and for how many years?
- Do I have to get a new medical to renew the policy?
- Is the policy convertible? Into what type of policy?
- Is the insurance policy participating (offers tax-free dividends) or nonparticipating?
- If participating, what is the five-year dividend history?
- If participating, what is this year's expected dividend?
- What is the total premium cost over the next 10 years (excluding dividends)?
- In 10 years, what will your cash value be?
- What will the total premium cost be over 20 years?
- At what interest rate can you borrow against the policy? Is the spread guaranteed?

3. Select only a high-quality insurance company; base your choice on company ratings. Price is not the only criteria you should look at when selecting an insurance company. You also want the company to be around to pay the benefits years down the road. Remember, you are looking for a long-term insurance relationship. Check with A.M. Best at www.ambest.com or Standard & Poor's at www.standardandpoors.com for ratings of your company.

4. Select an insurance agent with whom you feel comfortable and who does not pressure you. Study the agent's recommendations and ask for a point-by-point explanation if there are items you don't understand. If the agent can't explain all the costs and benefits, go to someone who can. While it is not necessary to have an insurance agent, it can be helpful because an agent can explain the many options and details of the life insurance contract. Remember to ask about the insurance agent's commission on any recommended product.

5. Use wisdom in your decisions. Make sure you check out the insurance company; read your policy when you receive it to ensure it is correct. Consider alternative approaches to finding life insurance: use the Internet or an advisor to help you. Make sure you feel good about the decision

before you sign anything or send any money.

Before you purchase life insurance, consider a few final thoughts:

- Be careful if your only source of life insurance is from your company. Consider having part of your insurance from outside your company's plan. Realize that if you get sick and lose your job, your insurance may terminate with your employment. It will be difficult to get new life insurance if you are very sick.
- Don't rush into a decision just because you are feeling pressured. Wait a few days and then decide. This is not a short-term decision. Take your time and choose wisely—but choose!
- Make your check payable to the insurance company, not the agent. The insurance company will pay the agent. Be sure the insurance agent gives you a receipt for all payments. Make sure there is an adequate paper trail in case there are questions or problems later on.
- Read your policy carefully during your “free-look” period. You are given a specific amount of time in which you have the option to cancel the policy. Make sure you understand your policy completely at the beginning and then review your policy annually. Your life situation may change, so make sure your policy is sufficient to meet your needs as they change.
- If you are changing policies, especially permanent policies, make sure you clearly understand the consequences. Surrendering one permanent insurance policy to buy another insurance policy could be very, very, very (get the hint?) costly. Understand all the costs of making a change before you make it.
- Finally, if you have a complaint, contact your insurance agent first. If you don't get an adequate response from your agent, contact your state insurance department; they can help.

Understand Plans and Strategies for Life Insurance

Following are a few ideas of life insurance plans and strategies over different time periods.

Life Insurance Plans and Strategies

Students and Young Marrieds

- If married, buy a small \$250k - 20 year annual renewable term product with the convertibility option. In case things happen to your health, you can convert to a (generally) whole life policy without a medical exam.
- Once children come, ladder on additional renewable convertible term products, extending out the life to the time that children leave home.

- If term insurance rates have decreased, you can purchase a new product then cancel the old.

Married with Families

- Make sure you have sufficient term policies consistent with LT 29 to protect those you love.
- Continue to ladder in additional policies and keeping their maturities longer consistent with the time children leave home.
- If you have filled your Roth/traditional 401k and Roth/traditional IRA investments and are looking for additional tax-deferred investments, you may want to look into permanent products. Be careful.
- If term insurance rates have decreased, you can purchase a new product then cancel the old.

Empty Nesters

- As your investment assets increase and children leave the home, you can allow some of the policies to terminate without renewing as the need for income replacement is diminished.
- If you would like to leave money to your heirs, think to maximize your contribution to Roth products, as these are wonderful assets to leave to heirs (the taxes have already been paid).
- If your desire and plans for estate planning materialize, you can utilize permanent insurance for some of those options. Be careful of costs.

Summary

Getting life insurance is an important step toward becoming financially self-reliant. We would be wise to have an appropriate amount of it.

Life insurance products vary widely, and they can be challenging to understand. It is critical to understand the major principles of life insurance and how life insurance can help you reach your specific personal and family goals.

In this chapter, we answered the five key questions about life insurance: 1. Why should you have life insurance? 2. How does it work? 3. Who needs life insurance? 4. How much should you have? and 5. What kind should you have?

Term insurance provides life insurance protection that is valid over a specific term, or time period. The major advantage of this type of insurance is that, in the short term, it is the least expensive death benefit coverage. However, this insurance is disadvantageous because it is valid only if the insured dies during the term of coverage.

Permanent life insurance is a contract in which premiums go toward both death protection and

savings. Cash-value insurance is often called permanent insurance and is intended to provide benefits over a lifetime. However, the policy will not be permanent if there is not enough cash value, if the insured is not able to continue paying the premiums, or if the investments decline substantially.

Determining which type of life insurance is right for you can be a challenge. For most people, especially students, renewable convertible term life insurance is the cheapest and best alternative. If your goal is income replacement, term insurance is relatively inexpensive and has the most affordable coverage when life insurance is needed the most; it is possible to carry the coverage for only the amount of time insurance is needed.

The five steps to purchasing life insurance are as follows:

1. Understand what you want.
2. Compare costs of competing policies.
3. Select only a high-quality insurance company; base your choice on company ratings.
4. Select an insurance agent with whom you feel comfortable and who does not pressure you.
5. Use wisdom in your decisions.

Assignments

Financial Plan Assignments

Your assignment is to prepare your vision, goals and plans and strategies for life insurance and include these in your [PFP Insurance Template](#) (LT01-09). First, determine whether you need life insurance. This drives your vision. Depending on your situation, you may not need it.

Second, determine your goal for having it. Deciding on your goal for insurance is a critical part of evaluating the different types of life insurance products.

Third, determine how much insurance you need based on the framework laid out in this chapter. Remember, as interest rates decline, the size of the assets you will need increases. I encourage you to use [Calculating Life Insurance Needs](#) (LT29 – Detailed) or [Fin200 Calculating Life Insurance Needs](#) (LT29B – Simpler) to determine how much insurance you need. This will be included in your Plans and Strategies, and will change over time.

Fourth, determine how much insurance you can afford based on your budget. This is a critical step. Take into account the potential for job loss or changes in lifestyle caused by children, teenagers, and so on when you are considering your budget.

Finally, evaluate the different insurance companies and the different products available. Using the criteria discussed, evaluate the different insurance companies for stability; look for signs that they will be around when benefits need to be paid. Determine the type of product you should

have, evaluate the different alternatives, and include your findings in your financial plan.

Learning Tools

[Calculating Life Insurance Needs](#) (LT29) - Detailed

This Excel spreadsheet gives a detailed framework for calculating life insurance needs. It gives estimates using multiples of salary, various rules of thumb, and a needs approach.

[Fin200 Calculating Life Insurance Needs](#) (LT29B) - Simpler

This is a simpler version of LT29, with fewer methods of calculation. Excel spreadsheet gives a detailed framework for calculating life insurance needs. It gives estimates using multiples of salary, various rules of thumb, and a needs approach.

Review Materials

Terminology Review

Annual Term Insurance. This is a type of term insurance. The face or death benefit amount is constant through the selected term of coverage. Premiums increase each time the contract is renewed, even though the face amount remains the same due to the increasing age of the beneficiary.

Convertible Term Life Insurance. This is a term policy that can be changed to permanent insurance within a specific number of years without evidence of insurability. Typically, it gives a contractual right to convert to some form of permanent insurance, typically whole life, within a certain number of years or before the policy holder reaches a certain age. Conversion allows the policy holder to lock-in the premiums, although at a higher rate, and avoid the ever increasing term premiums.

Equity Indexed Universal Life Insurance. Equity indexed universal life offers some of the upside of the equity market returns with the downside of insurance protection should the market returns be negative. It allocates assets to a stock market index, generally with options (and has a limited upside) but with a minimum guaranteed rate of return. It gives some (limited) upside in equity returns, and gives downside protection in down equity markets. It has huge commissions to salesmen for selling these products (up to 150% of first year commissions), a very high fee structure, large surrender charges, and is not transparent. Market returns are generally lower than historic market returns, are capped with limited upside of 2-4% after fees, and the insurance company can change the caps even after the product is sold if they are not making enough profit.

Renewable Term Insurance. This term policy allows the policy holder to unconditionally renew the policy for successive terms at higher premiums simply by paying the indicated premiums. Premiums increase with each renewal period, and can be renewed for a specific number of years

Universal Life Insurance. Universal life is a type of whole life insurance, but the cash-

value earns interest at current money market rates. Mortality risk is eliminated, and investment risk is low. It is a flexible policy that combines term protection and a tax-deferred savings element invested at current interest rates. Earnings will rise and decline with market interest rates. Its risks are the same with most permanent insurance: it is complex, expensive, with high surrender costs, and commissions to the salesmen are very high.

Variable Life Insurance. Variable life gives life-long insurance coverage with the ability to direct where the cash-value is invested. Mortality risk is eliminated, but investment risk is substantial. Policy holders are responsible for the investment outcome with their chosen investments. It allows for either a fixed (straight variable) or flexible (variable universal) premium, with fluctuating cash-value, reflecting the investment performance. It is complex, expensive, with high surrender costs, and commissions to the salesmen are very high.

Variable Universal Life Insurance. Variable universal life mixes the investment flexibility of variable life with the premium and face amount flexibility of universal life. Policy holders are responsible for the investment outcome with the chosen investment. It offers term protection with full policy flexibility and which can be managed by the account owner (within available options). It is complex, expensive, with high surrender costs, and commissions to the salesmen are very high.

Whole Life Insurance. Whole life insurance gives life-long insurance coverage for a fixed premium. Mortality risk and investment risk is eliminated. It is essentially term protection with a savings element provided by insurance company bonds and mortgages. Premiums are based on when you buy the policy. The earlier you purchase the product, the less your costs will be generally. It is also called “Straight Life” or “Ordinary Life” insurance. It is complex, expensive, with high surrender costs, and commissions to the salesmen are very high.

Review Questions

1. What is life insurance? Why should you have it?
2. What are the two different methods for determining how much life insurance an individual will need?
3. What is term insurance? What are the three types of term insurance?
4. What is permanent life insurance? What are the five major types of permanent life insurance?

Case Studies

Case Study 1

Data

Bill and Diana are concerned about their family’s welfare should Bill die. He is currently making \$80,000 per year, has two children, and his company gives him \$50,000 in life insurance coverage as a benefit. If Bill were to die, Diana could invest the insurance

settlement and make 5% with 2% inflation for 20 years until the kids finish school.

Calculations

What is the process for determining needs using the earnings multiple approach?

(Assume a 22-percent drop in living expenses after death.)

How much insurance should Bill have?

Case Study 1 Answers

a. Adjust salary downward:

Generally, family living expenses fall by 30 percent with the loss of an adult. The larger the size of the surviving family, the less living expenses drop.

Since Bill’s family would go from four to three, his target replacement is \$80,000

* (1 – .22) or

\$62,400

b. Choose the appropriate interest rate:

The return after inflation is $1.05/1.02 - 1 = 2.94\%$.

c. Determine the income stream replacement.

Number of years to replace income $N = 20$ years

Estimated after-tax and inflation rate $I = 2.94\%$

Target \$80,000 * (1 – .22) or $PMT = \$62,400$

Solve for the Present Value. Since Bill wants the payments at the beginning of each year, put your calculator in “begin” mode.

Bill needs \$960,877

4. Subtract out current insurance available of \$50,000:

$\$960,887 - 50,000 = \$910,877$

The multiple of salary is:

$910,877 / 80,000 = 10.76x$

Bill should have 10.8 times his salary, or \$910,877.

Six Methods of Calculating Life Insurance Needs (L729B)			
Current Age	22	Nominal Return on Earnings	5.0%
Current (or needed) Salary	80,000	Marginal Fed & State Tax Rate	0%
Years to Replacement Income	20	Estimated Inflation Rate	2.0%
Current Annuity Interest Rates		Real Return after Taxes & Infl.	2.94%
Payment Period Desired (1 – Beginning)	1	Mortgage remaining	
Spouse and Number of Children	3	Final Expenses (funeral, burial)	
Current Life Insurance	50,000	Debt and other Needs (college)	
6. Earnings Multiple Approach (Detailed)			
a. Adjust Salary Downward			
Current Salary			80,000
Percentage Adjustment to Salary (or needed salary)			22%
Salary to be Replaced			62,400
b. Determine the Income Stream Replacement			
Salary to be Replaced			62,400
Number of Years to Replace Salary			20
After tax Return		5.00%	
Real Return (after tax and infl.)		2.94%	
Payment Period Desired (1 – Beginning)			1
Present Value of this Needed Annuity			960,877
Earnings Multiple of Needed Annuity			11.91x
c. Subtract Current Life Insurance and Earning Assets			
Present Value of Needed Annuity			960,877
Less current life insurance			50,000
Total Additional Life Insurance Needs			910,877
Earnings Multiple of Needed Annuity after current Life Insurance			10.76x

¹ 1 Timothy 5:8

² “Handbook for Families: Preparing for Emergencies,” *Ensign*, Dec. 1990, 59

³ *Ibid.*, p. 113