Chapter 11. FUNDING METHODS

A. Introduction

Funding is more than just securing financing to build a project. Funding a project should be considered a process that has distinct steps and does not end when construction is completed and all bills are paid.

Funding agencies are encouraging applicants to develop their plans for funding concurrently with their preliminary engineering report and environmental reports. Funding plans encompass financing construction, paying for the operation and maintenance of a system, funding required reserves, maintaining financial viability, and preparing for future needs.

Each community seeking funding for a wastewater or other type of utility improvement project is unique. Therefore, it is not possible to have a standard recipe that communities can follow to acquire funding for their project. Funders in Kansas often remark the easy community wastewater projects have been funded and built. Future wastewater projects in our state most likely will deviate from the standard model used to finance and build community-wide centralized collection and treatment systems.

The standard model to finance and build a traditional central gravity collection and treatment system has worked well for many communities where there is an adequate population base to feasibly support such a system. Typically, a large diameter gravity flow collection system is used where possible, and when gradient problems occur they are overcome by using lift-stations. In Kansas, the choice of treatment has been the use of discharging wastewater lagoons. This type of collection and treatment system is often the first choice of governmental leaders because it is a system that is simple to operate, easy to maintain, protects the environment, and is long lasting. While some communities have the capacity to issue bonds to acquire funding, most communities have to seek financing from state and federal funding agencies. The majority of funds for these projects come from several key public funding agencies. These funding agencies provide low-interest loans that are repaid over a long period of time by the applying community or county. Monthly rates for customers are increased in order to generate enough revenue to make regular principle and interest payments to the financing agency as well as pay for operation and maintenance cost, and required reserves. Occasionally funding agencies will provide grant funds for a project too. Grant funds that are used do not have to be repaid. Grants are used to help less prosperous communities afford to build improvement projects.

A new committee with representatives from major funding agencies in Kansas has been developed which can assist small communities in sorting through these funding issues. Coined the "Kansas Interagency Advisory Committee" (KIAC), its purpose is to provide better guidance and direction to communities seeking funding for water and sewer projects. The committee facilitates better coordination and communication between agencies and organizations involved in water and

wastewater projects and issues as it counsels those communities. A fact sheet and summary of the committee can be found at the end of this chapter.

Funding agencies and communities are finding they are faced with a new set of circumstances that will require finding new ways to finance and build community wastewater systems for rural communities, especially very small communities. There are a growing number of small communities that cannot feasibly afford a traditional centralized collection and treatment system. Alternative collection and treatment methods including managed onsite and cluster systems must be evaluated to reduce costs to the point that the system is affordable.

Funds available for low interest loans and grants are limited, and demand is greater than the amount of funds available. Every year there are a few communities in Kansas, even with the full amount of assistance that funders can provide, that cannot afford to build an improvement project to correct serious environmental problems caused by poor wastewater treatment.

Applicants are being asked to contribute more of their own funds to a project if they want to be competitive for funding from funding agencies. Communities are being scrutinized more to determine if they have the technical ability to manage, operate, and maintain a wastewater utility.

The use of managed decentralized systems will present a challenge for funders. It is sometimes difficult to determine which agencies can be involved with what part of a project if a combination of centralized, cluster and/or on-site systems is used to address the wastewater treatment needs of a community. Certain components of these combination systems can be owned privately by the homeowner, and some funding agencies will only fund facilities owned by a public body.

B. Affordability

Affordability is the standard used by funders to determine what size and scope of project a community can feasibly develop. Affordability encompasses three basic concepts: (1) costs for the end consumer, (2) adequate design, and (3) cost-effective protection of the environment.

1. Cost for End Consumer

What an improvement project will eventually cost the end consumer (families, businesses, and public bodies like school districts) when completed is an important part of the affordability evaluation. Monthly user charges are typically used to determine if end user costs are too high. Funders do not want monthly user rates to be so high that an average customer cannot pay all of their utility bill. If enough customers cannot pay their bills, the community can get behind on making their required debt payments or, worse, default and not be able to make any debt payments.

Monthly user rates pay for operation and maintenance (O&M) costs as well as debt payments, and if required, debt service reserves. Adequate revenues have to be available to pay for the proper operation and maintenance of a system. Extremely high O&M costs can

push monthly user rates to very high levels. If monthly rates become too high, a community may not be able to pay for the proper care of their system; system failures concern regulatory agencies. New projects that start with high monthly user rates that are mainly due to the repayment of debt do not have much room to raise rates to pay for increasing O&M costs or future capital improvements.

2. Adequate Design

Customers naturally want to pay low monthly charges. To many consumers, the cheapest costing system is the one that is affordable. However, a wastewater system has to be adequately designed to properly treat wastewater, to function over a long period of time, and to protect the environment. Funders require all improvement projects to comply with federal, state and local environmental regulations and codes. No system will cost less than the amount it costs to build an adequate system. Your engineer has to design a system that properly treats your community's wastewater and protects the environment. End consumers should expect their monthly rates to be set at a reasonable level so their community can pay for and operate an adequate system. Funding agencies should be asked what feasible monthly user rate customers in your community can afford to pay.

3. Cost-Effective Environmental Protection

The third component of the affordability matrix is cost-effective protection. An engineer can design many different types of systems for a community that can adequately treat wastewater and protect the environment. Funders want a system they finance to be costeffective to operate. With limited funding resources, a funder wants the system to be the proverbial family sedan not a luxury car. Regulating agencies steer small communities towards systems that are easy and efficient to operate. As a system ages and through the inflation of costs such as wages, O&M costs can be expected to rise over the useful life of the system. Complex systems that are hard to operate and keep up can greatly accelerate the yearly rise in O&M costs. O&M costs in older systems can be greater than debt repayment costs. A system should be as simple to operate and maintain as possible. This will help reduce expected current O&M costs and slow the future growth of these costs. The system that can adequately treat wastewater and protect the environment for the lowest operating costs is usually considered the most cost-effective system. It is important to note that the competency of your operator to care for and operate your wastewater system can have an affect on determining the cost-effectiveness (something is not simple if the person asked to do a task cannot do it). Your engineer needs to assess the capability of your personnel or any management firms you hire.

Determining affordability is like buying a car. You have to determine how much you can afford to pay for the car without wrecking your budget. You have to determine if the car can adequately meet your basic needs. And you have to determine if you can afford to operate and maintain the car properly for many years. When designing your system the engineer will

have to balance all of the components of affordability. Working within the framework of affordability, the engineer will determine what collection and/or treatment technologies best fit the unique needs of your community. The engineer will design a system that patrons have the capability to pay for, that adequately treats wastes in a manner that protects the environment, and that is easy and efficient to operate.

C. About Funding Sources

The viability of water or wastewater development projects is often dependent upon available financing. Financial assistance from federal or state agencies, or both, can dramatically lessen your community's economic burden. A project can be funded from one agency or a group of agencies. Financial packaging is a new phrase to describe multi-type (grant and loan) and/or multi-source financing.

1. State Programs

a. <u>The Community Development Block Grant Program</u> (CDBG) is administered by the Kansas Department of Commerce and Housing (KDOCH). Community Development Block Grants have assisted small communities in their quest for new, expanded or rehabilitated water or wastewater systems. CDBG money comes from U.S. Department of Housing and Urban Development (HUD) and is allocated to each state to administer.

HUD has national criteria for projects with a community-wide benefit. The project must meet one of the following criteria:

- The community must have 51% or greater low and moderate income families.
- The project must have the goal of the elimination of slums and blight, in other words, it must improve the standard of living in the community.
- The project must eliminate an immediate threat to health or safety when there are no local reserves to do so. Wastewater projects should address the benefit to low/moderate income persons unless there is an emergency. The total financial package must be put together to receive a block grant. A ranking system is used to determine who gets block grants; local financial input improves a community's competitive position.

As the name implies, CDBG is strictly a grant program, normally with once-a-year application deadlines and subsequent ranking reviews. CDBG funding has a maximum amount, or cap, for which your community can apply. The cap is set by KDOCH, and varies with the grant category. Most communities and counties utilize the community improvement grant to fund wastewater improvements. Some other grant categories also can be used under special circumstances. More detailed information about the CDBG program can be obtained from:

Kansas Department of Commerce and Housing

Community Development Block Grant Program 700 S.W. Harrison, Suite 1300 Topeka, KS 66603-3712 785-296-3004

b. The Kansas Water Pollution Revolving Fund (SRF) is a loan program utilizing federal funds. In Kansas this program in administered by the Kansas Department of Health and Environment (KDHE). States receive federal funds, add a 20% match, and then provide low interest loans to participating communities. States may offer the loans interest free, but typically charge 3% interest to near market rate to cover interest on state bond issues and administrative costs. The maximum term of the loan is 20 years. These low interest loans can be used to round-out a financial package after grant monies are obtained. Kansas' SRF is a loan-only program. The purpose of this program is to provide low interest loans to municipalities or counties for water pollution control projects which include sewage treatment plants, interceptors, inflow and infiltration correction/control, collector sewers, and major sewer rehabilitation.

A project community must submit a request to be included on the KDHE priority list, have a sufficiently high ranking to move to the Intended Use Plan, and submit a complete application including design plans and specifications. Projects must comply with KDHE regulations for facility planning, environmental clearances, and construction contracts.

How it works: The agency informs the applicant it is on the Intended Use Plan, and the financing agreement is signed when the project design and application are complete. Repayment periods can be up to 20 years, and nearly all project costs can be included in the loan amount, including the costs of temporary financing and interest during construction. For more information contact:

Municipal Programs Section Bureau of Water Kansas Department of Health and Environment Forbes Field, Building 283 Topeka, KS 66620-0001 785-296-5525

- c. <u>The EPA Hardship Grant for Rural Communities</u> is administered by the Kansas Department of Health and Environment (KDHE). Any community or county sewer district with fewer than 3,000 residents can qualify for hardship assistance, if all of the following conditions are met:
 - The community is rural.
 - The community has no access to centralized wastewater treatment systems.
 - The proposed project will improve public health or reduce environmental risk.

• The community's per capita income is less than 80 percent of the national average, and; the community's unemployment rate exceeds the national average by one percentage point or more.

This program was designed to be used in conjunction with the state SRF program for wastewater, but other funding sources can be used as well. For more information about the program contact:

Municipal Programs Section Bureau of Water Kansas Department of Health and Environment Forbes Field, Building 283 Topeka, KS 66620-0001 785-296-5525

d. <u>The State Conservation Commission (SCC)</u> provides funds to local county conservation districts to help pay for the installation of onsite treatment facilities. This program is designed to address the problems caused by failing onsite wastewater systems. Possibly, this program could be used if your overall community wastewater plan calls for the installation of private onsite wastewater treatment facilities. Funding must go to individual landowners. Your conservation district will be listed under county government in your telephone book.

2. Federal Programs

a. <u>The USDA/Rural Development</u> (RD), formerly Farmers Home Administration, water and waste disposal loan and program is often the backbone of financial assistance. RD offers a loan and/or grant package, with a local share cost and a monthly user fee schedule comparable to similar communities in the state.

To meet eligibility requirements, your community must be in a rural area with a population less than 10,000 residents, and demonstrate an inability to get credit for the project elsewhere. Communities experiencing imminent threat resulting from problems with the water supply or wastewater system are given priority consideration. Funds can be used to construct, repair, enlarge, extend or improve water, sewer or solid waste disposal facilities.

RD Grants

To be eligible for an RD *grant*, your community must have a Median Household Income (MHI) that is below the non-metropolitan median household income of the state. The amount of grant money made available to your community is directly impacted by other grant money received, the median household income level of your community, and projected monthly user rates. A community's MHI is used to determine the level of grant eligibility. Two conditions must be met to be eligible for RD's poverty grant rate: (1) the community's

MHI must be below the higher of the poverty line or 80% of state non-metropolitan median household income level, and (2) the project is necessary to alleviate a health or sanitary problem.

RD grant funds are used to help a community afford a wastewater system. Debt repayment, operation and maintenance costs, and payments to reserves are paid for through monthly user costs. When these three cost items push monthly user fees past what RD considers to be an affordable rate, grant dollars are put into a project to reduce the RD loan amount which in turn lowers monthly user costs. RD periodically determines what it costs to provide wastewater or water service to typical rural residences found in similar communities that have like systems and economic conditions. This is referred to as the similar system cost, and is often expressed in the average monthly user cost of a system for a typical rural residence. RD personnel can give direction on what size user rate the agency considers your community can afford. If your projected average monthly user rate does not exceed the determined similar system cost, grant dollars are not necessary and will not be put into your project by RD. In some cases, if a community receives a CDBG grant, a RD grant may be reduced by the amount of the CDBG grant. This is not always the case, but it is an issue that needs to be discussed with your RD representative. For some projects a sizeable RD grant and a CDBG grant are necessary to achieve an affordable rate. Coupling CDBG funds and RD funds can help both agencies spread their funds farther and help more applicants.

RD Loans

RD <u>loans</u> are available to qualifying communities. The interest rate charged varies according to community income. The maximum term on all loans is 40 years; however, the repayment period may not exceed statutory limitations of the community's borrowing authority or the useful life of the proposed project.

RD state offices get their grant and loan money allocation early in the federal fiscal year (begins October 1). Projects compete for funding, and the agency strives to utilize all of the allocated money to fund projects. Unused allocated funds have to be returned to a national office. The returned funds from each state are pooled together, and projects submitted by the state RD office can compete for the pooled funds. Communities must follow an application process. Most of the allocated funds are usually committed for projects by late winter. Communities wanting funding in a particular fiscal year should try to complete the application process as early as possible in the fiscal year, preferably by November. A community or county may choose to have RD conduct a pre-application review for them to determine eligibility.

Applications for financing are accepted at all times of the year. RD will determine the amount of loan and/or grant financing a community or county is to receive, and not all applications are funded. When demand for RD funds exceeds available funding, and the

agency has to select the projects it determines to be the highest priority and most critical to health and sanitation issue. RD has a selection process for choosing projects to be funded.

For more information:

USDA – Rural Development P.O. Box 4653 Topeka, KS 66604 785-271-2730

- b. <u>The Economic Development Administration (EDA)</u> has helped thousands of communities with environmental infrastructure projects. EDA grants don't have any caps or limitations. A community must be designated by EDA, as a redevelopment area to be eligible for funds. To be designated a redevelopment area, a community must have high unemployment. Grant funds are tied to the ability to create and retain jobs in the redevelopment area. The application process is simple and all available money is in grants. However, the level of available funding from EDA doesn't remain constant.
- c. <u>Farm Credit Banks CoBank</u> is a federally chartered and regulated bank that serves rural utility systems and agricultural cooperatives. As Rural America's Cooperative Bank, CoBank specializes in rural utility, cooperative agribusiness and export financing. Recently, CoBank obtained new and broader authorities to lend to water and wastewater systems.

CoBank provides loans to credit-worthy rural utilities, including water and wastewater systems. The systems must serve unincorporated areas and/or incorporated communities of less than 20,000 population.

Loan programs provide financing at fixed and variable interest rates for working capital, capital improvements, construction and upgrades to the systems, equipment and refinancing of existing debt. It also offers interim loans for systems waiting delivery of approved federal funding.

3. Special Categories of Funders

- Indian Health Service, Bureau of Indian Affairs, Bureau of Reclamation and Housing and Urban Development, for example, offer programs for communities in specific locations, such as Indian Reservations.
- The Department of Agriculture offers assistance for areas on or near a national forest.
- The Department of Interior offers assistance for areas on or near a national park.
- The Natural Resource Conservation Service (formerly Soil Conservation Service), U.S. Army Corps of Engineers or Bureau of Reclamation may offer assistance to projects within a designated waterway or for those building a reservoir for water supplies.

- The Environmental Protection Agency (EPA) has demonstration money, job training or job creation programs for poverty and minority areas.
- The Federal Emergency Management Administration (FEMA) provides financing for repairing damages caused by natural disasters.

D. Funding Basics

Wastewater projects in Kansas are usually funded through borrowing (issuing bonds), grants, and/or applicant contribution.

1. Bonds

In Kansas, counties or municipalities cannot borrow money directly from a lender. Instead, these units of government must issue bonds that are purchased by individuals, by a commercial lender, or an agency of the government. It is important to understand bonds for a construction project are typically issued for a set period of years, and your city or county has that period of years to redeem the bond or bonds from the bond holder (the person or entity the bond was sold to). Usually specified periodic payments are made until the single bond or all of the bonds are redeemed. Bonds are redeemed at their original face value plus interest. The redemption of bonds is similar to the repayment of a debt. The longer the redemption or repayment period is the lower each installment payment will be. The installment payment is paid by customers through their regular payments or their monthly bill. Revenue is collected through user rates or taxes, and enough revenue is collected to make regular installment payments (bond payments). Lower installment payments translate into lower rates for customers.

2. Grants

A grant is a sum of money awarded to a State or local government or non-profit organization. Typically, grants are awarded by the federal government to State or local governments, or by States to local governments, for the purpose of financing a particular activity or facility. The grant money represents a transfer payment from one organization to another for a purpose deemed necessary or desirable by the awarding organization.

The primary advantage of grants is that State and local governments and other eligible recipients do not have to use their own resources (which they may or may not have) to pay the specific eligible construction costs that the grants cover. Grants can be highly useful in addressing affordability concerns and can leverage additional resources through matching funds.

It is important to note though that grants have special limitations. Applying for some grants can be costly, time-consuming, and require trained staff to write grant

applications. These grant applications can take months for the awarding organizations to process and award. Even then, due to the intense competition at both the State and the local levels for the limited pool of grant funds, State and local governments and other recipients may find it increasingly difficult to acquire grant funding for many projects. Due to grant project eligibility limitations, only a percentage of the total project costs may be eligible for grant assistance. Providing matching funds, often ranging from 5 to 50 percent, may be difficult.

Grant funds often have co-conditions that affect the scope, intent, nature or cost of the project or program in question. Certain grant conditions, such as mandatory grant reviews and production of detailed reports, may increase the overall cost of the project. Most grants also require that grantees must comply with other federal laws and regulations regarding a range of factors such as wage rates, anti-discrimination, and environmental requirements.

Reference for further information: an excellent source of information regarding a wide range of federal grants is the *Catalog of Federal Domestic Assistance* available from the U.S. General Services Administration.

3. Applicant's Contribution

This section discusses ways for an applicant to make a contribution to a project. Typically such a contribution is made at the beginning of the project. However, a contribution can be made at anytime to accelerate the repayment of a debt or retirement of a bond (providing the lender or bond holder allows early retirement of your obligation). Applicant contribution will also mean the cost of materials you donate or the value of the self labor you provide to complete the project. Some of the these suggestions may not generally be applicable to very small systems. However, through creative thinking and willful determination, even small communities can use these ideas. Larger communities and counties (for a sewer district) should consider these measures.

In the past, an applicant's "up-front" contribution often amounted only to paying for the cost of a preliminary engineering report. It was assumed by applicants that they then would pay for the majority of project costs over an extended period of time in the manner directed by a governmental agency or bond company. Paying for a portion of expected project costs at the beginning was not a common practice for applicants in the past.

Today, many funders expect an applicant to make some sort of "up-front" contribution to the project. The communities that pledge to contribute some of their own resources at the beginning of a project will find their funding applications to be more competitive. As competition for limited funds increases, up-front contributions will become an increasing important factor in determining what projects are funded. Contributions at the beginning of a project can reduce the amount of money a community has to borrow for

a project. Thus, total lifetime interest costs for a project can be reduced. Some communities contend they cannot contribute anything up-front. In some cases this is true, and the applicant should show the funder why a contribution cannot be made. However, with a little resourceful planning and thinking and effort many communities can make a front end contribution. The following things should be considered:

a. Voluntary User's Fee Agreement

If you plan to build an entirely new system, consider establishing a voluntary user's fee <u>agreement</u>. Customers living in the benefitting area voluntarily sign a user's agreement that stipulates they promise to pay a monthly payment, or slightly lower yearly payment, in exchange for the right to connect to the completed wastewater system at no cost or at a reduced cost. Payments are made to the governing body, and the agreement states money paid will be reimbursed back to the customer if the project is not built within a set period of time, for example three years. Customers that do not sign the voluntary agreement will be charged a higher connection fee when they are connected to the completed system. It is important to know that such agreements may cause problems with Community Development Block Grant (CDBG) funding. If your community plans to seek CDBG funding, your leaders should contact someone from the CDBG program and find out if your voluntary user's agreement plan is acceptable to the agency.

b. Special Assessments

Special assessments can be used by governing bodies to generate up-front funds for a project. If you are thinking about using assessments, ask your attorney or bond counselor if you can start the assessment before construction starts. A special tax assessment is charged against each lot in the benefitting area for the purpose of providing future access to a wastewater system. The amount of the charge is usually less than \$20 per month for an averaged sized lot. The amount of the charge is allocated between all lots on a per square foot basis or on the basis of the linear frontal footage of a lot. Developed lots and lots that could be developed in the future all pay the same charge for access to the system.

Owners of undeveloped lots will complain they should not have to pay for a system that is not benefitting their lots. It is argued undeveloped lots do benefit since the value of a lot is increased because it becomes a lot having access to improvements. Secondly, these fees address issues of equity regarding future connections. Often the original households, that have paid for a system for a number years, consider it to be unfair for newly connected households to derive benefit from the system because the new households have not fully contributed to the retirement of the total original debt. Through a special assessment for access to the system, undeveloped lots can help pay for the system. If an assessment is charged from the beginning of the project and

maintained, it will be difficult to justify charging a connection fee when a new home is built.

For developed lots with homes, an assessment fee becomes part of the minimum charge that covers the payment of fixed charges; this revenue stream is stable and predictable. It difficult to predict the flow of the revenue stream from undeveloped lots. Sometimes the owners of some of the undeveloped lots will refuse to pay their taxes, and the county or a city eventually may wind up owning the lot. Your community or county cannot collect taxes from property that it holds title on.

When computing future revenue, funders either refuse or severely limit a community from counting on receiving revenue through assessments on undeveloped lots. Assessments on undeveloped lots can be a problem for a county trying to form a sewer district for an unincorporated area. Statutes require the owners of 51% of the acreage in a sewer district to sign the petition to form a district (see Chapter 10). Commonly, just a few parties own the majority of the land in a sewer district, and likely the land they own is undeveloped. If a sewer district (county) is serious about using assessments, leaders should find out how these larger landowners will respond to an assessment. Their refusal to sign the forming petition could cause problems for a county. Your attorney, engineer, and financial planner should be involved in the creation of a plan for an assessment.

If your community is seeking CDBG funding, a grant specialist should be contacted. The CDBG program has special provisions about charging low and moderate income families an assessment. A grant specialist can detail how assessments could affect your project. Assessments can be a good financial tool if supported by customers owning both developed and developed lots. Involve potential funding agencies in any plan to use assessments.

c. Developer contribution

For some rural communities the addition of a community sewer system will spark new housing growth. This is especially true for a community near a metropolitan area or a larger rural community. People desire to live in a small town, but work and shop in a larger community. If a developer has indicated to your community he will build new houses in your community providing a community wastewater system is built, that developer should be asked to make a developer contribution to the project. Preferably this should be done up-front and this money can be applied to the project. A contribution from the developer shows he is serious about building, and the system can be adequately designed for the number of expected users. Funders are very reluctant to finance extra system capacity on someone's verbal promise to build homes. A financial commitment to a project is a strong indicator the developer will erect the homes he promises to build. If the developer is actually building a utility system in an area or for a subdivision, funders will require such a system to meet federal, state, and local environmental

regulations and be engineered and constructed within accepted professional standards. It is important to note that RD does not finance the cost of the system for developers. Developers either contribute their own share of the costs or provide land that assures they will pay their share of the costs.

d. Self-help

In some parts of the state, communities are pledging an up front contribution of human, material and financial resources to reduce costs and make projects affordable. The concept is known as self-help. Funding agencies in Kansas are now using this concept as a component of a funding plan. Self-help as we define it includes the use of volunteers The Rensselaerville Institute in its Self-Help Handbook for Small Town Water and **Wastewater Systems** states "self-help refers to collective effort: people working together to create or improve a service or facility that they will use in common but which is not exclusively owned by one person or household. It is different from the concept of sweat equity by which an individual gains private ownership of something. as one technique, among many, that can reduce the cost of a needed community improvement. With the self-help approach, small communities draw on their own resources -- human, material, and financial -- to solve local problems." The handbook describes one community that rented equipment and used self-help volunteer labor instead of a contractor to put in a water system. CDBG is currently offering a program for communities to address their wastewater needs in this manner. Small communities are encouraged to ask funding agencies if they can contribute equipment, materials or labor to a project during or after construction. Simple steps such as (1) having a qualified resident inspector volunteer to provide his services free (most likely a retired citizen in the community), (2) someone could volunteer to administer a CDBG grant free of charge, or (3) someone could pledge to provide bookkeeping service for free to reduce future operation and maintenance costs. Creative thinking is the key to self-help. You must be able to prove to a funder you are capable of doing what you say you can do and/or can provide the items that you pledge to provide.

e. Funding Partners

Many small communities, incorporated and unincorporated, find it difficult to raise funds to pay an engineer to prepare a preliminary engineering report for them. The idea of raising more funds beyond this seems overwhelming. At this point, it is important to understand that others beside your governing body have a vested interest in your community. It is important not to overlook others that might be funding partners. Any entity that provides funds that are used towards the development of a project should be considered a funding partner. Most likely a funding partner will become involved in your project because it is in their own self-interest to do so. Businesses, other utility providers, key citizens, non-profit entities, or other governmental units like a school district are potential partners. You should not expect these funding partners to help with

paying for a large percentage of the project. However, the aggregate contributions of several of these types of partners could provide enough money to pay for hiring an engineer.

A community should not overlook seeking help from their local electric utility company. Some rural electric cooperatives have the ability and interest in participating in the funding community and/or business project that are for the purpose of creating economic development in rural areas. You should contact your area electric cooperative and ask for assistance. The Kansas Electric Power Cooperatives, Inc. can provide information, advice and assistance to your local electric or telephone cooperative regarding how they can be involved in a community improvement project. Your electric cooperative or utility may be willing to put some of its funds into the project, especially for start up. An electric company can gain financially if the population of an area remains constant or grows. Also, an electric or other utility may not be able to offer financial support, but may have other resources to offer such as bookkeeping help.

Local financial institutions need to be approached. These institutions need to understand that when improvement projects are built, temporary construction financing will be needed, and local financial institutes could be a source for these funds. A future business opportunity and being able to help the local community may be considered good reasons for a financial institution to become a funding partner.

Look for win-win situations with industry and non-profit organizations. For example, a large business nearby may be required to have wastewater treatment lagoons that could also be utilized by your community. A non-profit organization may have a campground near your community, and it might be possible to develop a beneficial arrangement with the organization if they need a wastewater system, too. Before approaching anyone to ask them to be a funding partner, determine how that entity can benefit by being involved and have a specific amount of money in mind that you would like to receive from them.

E. Self-Funding (Commercial Financing)

Some small cities and counties have the ability to fund the construction of a wastewater project without involving a state or federal funding agency. Self-funding is when a community or county issue bonds that are purchased by individuals or a commercial lender(s). No public governmental financing agency is involved in such funding packages. State laws regarding the issuance of bonds dictate how bonds are to be issued. The governing body that issues the bonds must work closely with a bond counselor and bond company. It is important to know when it is best to issue bonds and when the payments to your engineer, attorney, and contractors need to be made. A financial advisor, usually an employee of the bond company, can give a city or county important direction. Some agencies provide this guidance through their trained staff.

It is important to understand bonds for construction project are typically issued for twenty years, and your city or county has twenty years to redeem the bonds from the bond holder (the person or entity the bond was sold to). Usually specified periodic payments are made until all of the bonds are redeemed. Bonds are redeemed at their original face value plus interest. The redemption of bonds is similar to the repayment of a debt. The longer the repurchase or repayment period is, the lower each installment payment will be. Your installment payment is paid by your customers through their regular payments. The longer the repayment period is, the lower each installment payment will be. Revenue is collected through user rates, and enough revenue is collected to make regular installment payments (bond payments). Lower installment payments translate into lower rates for customers. It is important to know when a state or federal funding agency is involved in a project, the funding agency will purchase all of the bonds your city or county issues. Bonds have to be repurchased from the funding agency. Rural Development allows the bonds they buy to be redeemed over a forty-year period. RD's longer redemption period can mean lower user rates, but can also mean higher total interest costs for your community. Your governing body may have to decide whether it wants lower user payments or lower total interest costs when trying to decide whether to self finance or seek funding assistance from a state or federal agency. The only source of grant funding when selffunding is used is the CDBG grant program.

Types of Bonds

Two types of bonds are generally issued by counties or cities; general obligation or revenue bonds. The taxing authority of a governing body is the guarantee that <u>General Obligation (GO)</u> <u>bonds</u> will be redeemed. In Kansas, GO bonds that are issued for the purpose of paying for the construction of public works shall not be included in computing the total bonded indebtedness of a city for the purposes of determining limitations on bonded indebtedness as provided in Kansas statutes. For counties, a bond counselor should be consulted about the level of debt a county can assume for a construction project. Because GO bonds are backed by the full faith and credit of the governing body, these types of bonds are considered to be the most secure bond; bond holders are more confident their bonds will be redeemed. Thus, GO bonds have lower interest rates and reserve requirements than other types of bonds. In some cases before GO bonds can be issued, voter approval is needed. You should consult with your attorney about whether a bond election will be necessary.

The other type of bond that is often used in Kansas to finance infrastructure projects are revenue bonds. *Revenue bond* is a broad term used to describe bonds on which the debt service is payable solely from the revenue generated from the operation of the project being financed or from other non-tax sources. This type of bond is not considered to be as secure as a GO bond. The bond payment is secured by a revenue pledge. The bond company may require steps to be taken to show adequate revenue will be available. Revenue bonds typically are tax-exempt. Interest rates for revenue bonds generally will be higher than for GO bonds, and reserve requirements will be higher as well. Voter approval is generally not necessary to issue this type of bond. If this type of bond is used, your community should establish a way to generate a

predictable and steady revenue stream. This is best accomplished by establishing a minimum charge for each connection; usually every connection of the same class will have the same minimum charge. The total amount of revenue collected from the minimum charge should be enough to make your regular bond payment, and possibly the reserve payment.

When considering using only bonds to fund a project, it is a good idea to visit with your bond adviser or bond company about <u>other types of bonds</u> that might be available to fund environmental improvement projects. This is especially true if your community is considering developing some sort of public-private partnership.

F. Funding By One Agency

Most funders require a community to fund part of a project even if a grant is provided. The community usually pays for its part of the project over a period of time. Funds for a project are obtained through borrowing (issuing notes or bonds). When a community deals with only one state or federal funding agency, the project is considered to be funded solely by one agency. Sole funders are usually the KDHE SRF program or RD.

Working with only one funding agency can be easier for an applicant. It is easier to follow one set of rules and to deal with one agency representative. Also the applicant does not have to deal with working around the funding cycles of the different funding agencies

G. Leveraging - Joint Funding of Projects

The need for the addition of grant dollars to a project is the usual reason for having more than one funding agency involved in a project. Grant dollars are often needed to make a project affordable for a community. On occasion even a RD funded project requires additional grant funds from another source (RD provides loan and grant funds). Grant funds are sometimes needed with SRF funded projects, too.

When more than one funding agency is involved in a project, the project is said to be jointly funded. Most often in Kansas, the CDBG program is the joint funder. When more than one agency is involved it is important to maintain communication between the two funders. Each funder has separate application items that have to be completed in specific ways. It is important not to assume that a step taken for one funder will suffice the requirements of another funder. Ask all funding agencies what application steps in their programs can be combined or done at the same time with other funders to create efficiency in the process.

The CDBG program, USDA-RD, and KDHE-SRF is encouraging funding applicants to meet with the Kansas Interagency Advisory Committee. This committee is made up of representatives from these three organizations. While funding does not hinge on meeting with KIAC, this committee can provide general up-front counseling on how to best proceed. A KIAC review also can be helpful with establishing a good line of communication between funders and an applicant. Meeting with KIAC is strictly voluntary. If an applicant is interested in utilizing KIAC's

services they should contact one of the three committee agencies for directions on how to meet with KIAC.

Once a project is funded, the agencies will work together to determine how funds are distributed to a project. If you are using two funders, understand what each will pay for, and before starting construction, fully understand how to submit bills to the funders for payment.

H. Phasing

Every funding agency has a limited amount of loan and/or grant funds it can distribute each year. Large projects are often too costly for one funder to handle by itself in any one funding cycle (fiscal year). Large projects are usually funded either through joint funding or phasing. Joint funders pool their resources together to develop a sizable funding package that is large enough to finance the project in one year. Phasing allows a funder to extend the development of a project over several fiscal years. Phasing enables the funder to put a modest or reasonable portion of its limited funds into a project each year; this allows the funder to have funds available for other communities, too. In the end, the funder will fund the construction of the entire project. Funders such as RD can by pass an eligible project for funding if the project will use 25% or more of the state's allocated monies.

Phasing also allows the development of some projects to be accelerated. For example, you may have a project that requires a CDBG grant, but has a stand alone portion that could be funded by RD. Instead of waiting a whole year for the next CDBG grant funding application date, you may be able to get funding from RD for the stand-alone portion. While starting the construction of the stand-alone portion, you can complete a CDBG application. This may accelerate the start of a project by six to nine months. Confer with your engineer and funder if you think phasing in a possibility.

I. Funding Centrally-Managed Decentralized Site-Based Wastewater Treatment Systems

The use of alternative wastewater systems, especially those that incorporate facilities such as septic tanks and pumps that are on individual owners' properties, adds a layer of complexity to management and funding. The technical aspects of these systems were discussed in Chapters 4, 5, and 6. These technical aspects of alternative wastewater systems are reasonably well-established, if not well known. The use of central management for decentralized, site-based system is less recognized.

1. Establishing Centralized Management

a. Why is it needed?

In the past few years, the U.S. Environmental Protection Agency, among others, has come to the realization that many of the nation's remaining unsewered communities, incorporated or unincorporated, cannot feasibly be served by a traditional community collection and treatment system (central gravity flowing collection system that uses large diameter pipes and a central treatment system). While the traditional model still is the goal communities try to obtain, other alternative systems are available to provide wastewater treatment when it too costly to build a traditional central wastewater system. Central management is required to insure these special systems are properly operated, maintained, and financed.

Community control is essential to meet many funders' eligibility rules. For example RD's <u>service area rule</u> states that a wastewater system shall be for public use; ie. part of a public system. Facilities, including septic tanks and secondary effluent treatment systems, are usually owned or at least controlled by the governing body. Under central management, the septic tank is controlled, maintained, and managed by the governing body, but the landowner still owns the land. Access to the land for the governing body is attained through a perpetual facility easement.

b. Attaining Funding

Attaining funding for one of these special systems will take work. First, your engineer will have to be open minded to look at these systems and evaluate them objectively (see Chapter 9). The EPA and KDHE can provide the names of communities that are using these types of systems; check out these communities and visit with their leaders. It will be necessary to get the approval of state or local regulatory agencies to use any of these special systems. This approval should be attained early in the process, and you should be prepared to state your case as to why you want to use a system. Your customers will have to be educated; there may be a bias that these special systems are not as good as a centralized system. Customers will have to be shown that central management will yield the same advantages of traditional central community systems.

For funders, your community will have to prove several points. First, a community must prove to a funder that a traditional centralized community wastewater system is not a feasible option. Second, your community must show it has ingress and egress to a property to take care of a septic tank and/or a secondary treatment system. (Ingress and egress are the right or permission to enter or leave, respectively.) Egress and ingress are assured through a perpetual facility easement. Third, you will have to prove the system will be under central management, controlled by the governing body, and you have the capacity to manage the system. The perpetual facility easement is the key to establishing

central management and control. Centralized management is necessary to insure a system is properly constructed, maintained, and financed. Facilities and components should be owned or controlled by the governing body. Also funders expect the governing body to have the ability to collect revenues, to pay debts, and to operate the system. A city can always use its authority to tax property and collect revenues. A county that governs a sewer district can also use its taxing authority to collect required revenues.

It is important early on to identify which funders can or are willing to fund these special community wastewater systems. When your governing body has central management and control over these systems, the doors to funders begin to open. USDA-RD, KDHE SRF fund for wastewater, Kansas' CDBG program, EPA's Hardship Grant, and possibly your local conservation district (for facilities owned by the homeowner such as a septic tank) are potential funding sources. Again, contact the KIAC committee to discuss your proposal early in the process of evaluating alternatives.

c. The Community's Responsibility

In approaching these funders you will need to:

- Prove that it is not feasible to build a traditional central collection and treatment system.
- Prove that a system is properly designed and will not pollute the environment.
- Prove that you can meet state and local regulatory requirements.
- Prove that you will have control over the system through ownership, easements or lease of facilities.
- Prove that you will have ingress and egress to onsite facilities located on private property.
- Prove that you have a workable management plan, and you have the capacity to fulfill it.
- Prove that you have a mechanism to collect the revenues necessary to pay debts and operational and maintenance costs.
- Prove that you have the means to collect unpaid fees or can deny other utility services for non-payment of sewer user fees.
- Prove that facilities such as septic tanks and secondary effluent treatment systems
 have a useful length of life, and that you have a plan to replace facilities that
 reach the end of their useful live. A capital improvement fund may be necessary.
- Prove that you will have equitable rates.
- Prove that you have a plan to pay for the ownership or lease of usable existing facilities that are privately owned such as septic tanks.
- Prove your design is practical such as having required risers for easy septic
 tank pumping access and a port for testing out-flowing effluent, if an advanced
 treatment system is used.

• Prove you have a planned program to inform patrons on how to properly use and protect septic tanks and related equipment.

d. Decentralized Management

If decentralized managed systems are a potential option, your engineer should meet with regulatory agencies before starting the Preliminary Engineering Report (see Chapter 8). Specialists from K-State Research and Extension can help provide information about onsite wastewater systems. KDHE and your local Local Environmental Protection Program (LEPP) specialists can help answer questions about the placement and design of onsite wastewater systems. Next, you should meet with funding agencies (i.e. attend a KIAC meeting), and ask if they can or are willing to fund these special types of systems. Seek what requirements must be met, and incorporate them into your application and development plans.

Once the Preliminary Engineering Report is completed, meet with your customers. Your engineer and attorney must be at this meeting. It would be very helpful to have a wastewater specialist that is familiar with these kinds of systems present. Explain why your community is considering using a special type of community wastewater system. Explain the concept of community central management and why it is advantageous for customers. Customers will need to understand that the community will need perpetual facility easements from them. Explain your proposed plans for rates, and stress that a landowner will not be faced with the sudden expense of replacing their own system; customers will pay regular and predictable user fees. Customers need to understand that the entire community, through revenue generated from user fees, is paying for debt, operation, maintenance, and reserve costs. Explain to customers your plans to pay for or to lease usable existing facilities that are privately owned. Stress to your customers that voluntarily granting of easements and agreeing to reasonable compensation for usable facilities will help reduce end costs.

e. Perpetual Facility Easement

The **perpetual facility easement agreement** is the key to central management and control. *Perpetual* means permanent. The dictionary defines *easement* as a right or privilege that a person may have in another's land. The easement agreement gives the governing body the right to place publicly owned, leased or controlled wastewater facilities on private property, and to have access to such facilities in order to maintain, operate and replace them. If customers have problems with this, the agreement could state that in the event community service is not provided or a traditional gravity centralized system is used, the easement agreement can be modified. *Facility* encompasses the components of the wastewater system. Septic tanks, secondary effluent treatment systems, and connecting pipes are facilities. For soil absorption lateral fields, facilities would include the area necessary for the system to work. The agreement should

stipulate the governing body has the right to place any facilities on the homeowner's property that is covered by the easement. The agreement must stipulate the governing body can own, lease, or control these facilities. The agreement should state the governing body can sell or lease onsite facilities to others, but the governing body must retain control on how the system is managed.

The perpetual facility easement agreement should:

- State the exact area of private property the easement applies to.
- State the governing body can place wastewater treatment facilities on the easement.
- State only regulatory-approved facilities will be placed on the private property.
- State the governing body is responsible for the maintenance, operation, and replacement of facilities on private property.
- State the governing body is responsible for all liability due to system environmental mishaps.
- State that the governing body can own, lease, or control through agreement any facilities located on the property covered by the easement. Facilities can be owned or leased by another entity, but the governing body must retain control on how the system is managed.
- State the landowner will not restrict access to facilities. Buildings on the easement must be on temporary foundations and landscaping may be disturbed if facilities are repaired or replaced.
- State that authorized personnel or other parties representing the governing body have ingress and egress to an easement for the purpose of operating, maintaining or replacing wastewater facilities.
- State how property damages are to be addressed.
- State the governing body has management control over any wastewater facilities located within the easement area. This control applies to whether facilities are privately owned or owned by the public. Control is defined through the establishment and enforcement of ordinances or resolutions that dictate how the system is to be operated, maintained, and financed.
- State the landowner agrees to use the wastewater system designed to serve his property, and in a manner that is prescribed by the governing body.
- State the landowner agrees to pay regular user fees to the governing body, or a representative of the governing body, for the purpose of maintaining, operating, repaying debt, and/or the replacement of wastewater treatment facilities on the landowner's property and other property served by the wastewater system that is common to the same service area. Rates, payment schedules, and financial administrative procedures will be set by the governing body. The landowner recognizes the governing body can utilize its taxing authority on property to collect user fees.

The last three points of the above list are designed to establish central community management. Funders require (1) homeowners to use the community system, (2) a system be in place to collect revenue, and (3) the governing body to have the means to establish and enforce rules covering the operation, maintenance and financing of a system. Your community should expect to pay a nominal fee for an easement and to pay a fair value for any usable facilities that are purchased or leased. A governing body in Kansas has the right of eminent domain to obtain an easement necessary to protect the health and safety of its citizens. Other laws allow a governing body to establish community wastewater systems, and to adopt ordinances or resolutions necessary for the efficient and effective management of these systems. However, the voluntary signing of a comprehensive perpetual facility easement agreement is the desirable way to go.

2. Establishing User Fees

Funders are concerned about the issue of **equity** between homeowners. First, they want to know how a community will handle the use of existing facilities. For example, when one neighbor has installed a new septic tank that can be used as part of the community wastewater system and the second neighbor has a failing septic tank that cannot be used, a funder will want to know if the landowner with the failing system will have to pay a higher user rate. This whole dilemma can be avoided by purchasing and/or leasing usable existing facilities from landowners. A governing body simply purchases usable infrastructure instead of purchasing new infrastructure. The usable facilities could be purchased outright at the beginning of the project or through a lease purchase agreement. All homes would pay the same user rate. Some landowners though may receive regular payments for the sale and/or lease of their wastewater facilities to their governing body. Administratively the payment of user fees by the customer and the payment/lease for facilities by the governing body should be separate transactions.

There are various ways the user rate can be set up. The easiest format to use is a modified flat rate. Enough revenues are recovered through user fees to pay for all costs of the system. The community is responsible for the costs together, and costs are apportioned equally among the dwelling, businesses, and other entities served. The rate is composed of three or four components. These components are:

a. <u>Minimum charge</u>: All fixed costs such as debt repayment are placed in this account. The total costs for a specified period are divided equally by all entities served. For example, if the annual debt payment for a 100 home community is \$10,000 the \$10,000 is divided by 100 then divided by 12 to determine the monthly minimum charge for each home.

$$$10,000 \div 100 \div 12 = $8.33$$

b. <u>Operation and Maintenance (O&M) charge</u>: All costs attributable to the operation and maintenance of the system, including personnel costs, are placed

in this account. The total costs for a specified period are divided equally by all entities served. For example, if the annual O&M charge for a 100 home community is \$12,000 the \$12,000 is divided by 100 then divided by 12 to determine the monthly O&M charge for each home.

$$12,000 \div 100 \div 12 = 10.00$$

c. <u>Contribution to required reserves charge:</u> Funders can require borrowers each year to make a contribution to a reserve account. The reserve account serves as a source of funds to pay debt payments when an emergency arises and a community cannot make its regular debt payment. The reserve contribution is usually equal to 10% of the annual loan installment. The total contribution then for a 100 home community with a debt payment of \$10,000 would be \$1,000. To figure a monthly charge for each home take \$1000 divided 100 divided by 12.

$$1,000 \div 100 \div 12 = 0.83$$

d. <u>Capital improvement account charge:</u> Because some of the facilities of an onsite treatment system may have a useful life shorter than the length of your loan, your engineer or funder may suggest that your community have a plan to systematically replace aged equipment (facilities). To build up enough funds to make periodic improvements, a capital improvement account will be established. Each year a contribution is made to this account. Assume the engineer says \$12,000 a year should be placed in a capital improvement account. All homeowners would be equally charged to generate enough funds to make the contribution. For a 100 home community, you would take the \$12,000 divided by 100 divided by 12 to determine the monthly charge.

$$12,000 \div 100 \div 12 = 10.00$$

e. *Total monthly user fee* The total of these monthly charges becomes the *total monthly user fee*. The Operation and Maintenance (O&M) charge will be variable, and over time will likely increase. The O&M analyzed at least every year. If not enough revenue is being generated to pay O&M costs, then this charge will have to be raised.

Examples:

 With capital improvement account.		No capital improvement account.	
Minimum charge	\$ 08.33	Minimum charge	\$ 08.33
O&M charge	\$10.00	O&M charge	\$ 10.00
Required reserve		Req. reserve charge	\$ 00.83
charge	\$ 00.83		
Capital Imp. Acct.	\$ 10.00		
Monthly total user charge	\$29.16	Monthly total user charge	\$ 19.16

3. Public-Private Partnerships

The use of centrally-managed decentralized and site-based treatment wastewater systems opens up interesting possibilities for private-public partnerships. For example if a community uses septic tanks for primary treatment and effluent pumps are used to transfer effluent to central treatment lagoons, it is possible that the landowner or a business could own the septic tank, providing the community retains management control over the septic tank. In this situation, a landowner may have access to funding sources the community does not. A business could own the septic tanks and have a contract with the governing body to maintain and operate them in a manner prescribed by the governing body. Such a business could sell the tanks to the community after they have depreciated in value and the business no longer can claim a tax deduction for them. The tanks could be depreciated over a five year period, and could be sold to the community for a fraction of the cost of a new septic tanks. The tanks would still have useful life, and the community would most likely continue its operation and maintenance agreement with the business. This is just one example of partnership. It is important to remember KDHE will require the portion of a system that discharges into a watercourse to be owned by an incorporated city or a county.

J. Special Funding Arrangements

The earlier sections in this chapter discuss the funding methods that are used most often for small communities. However, there are other funding possibilities that may be considered, if they are appropriate for a community's individual circumstances.

1. "Up-Front" Sources

a. Raising rates

For an established wastewater utility system, <u>raising rates</u> is a way to quickly generate funds for an up-front contribution. From beginning to end it can take one to two years for your community to complete an improvement project. After the project is built, your community will start paying for your new improvement project, and at this point monthly

user rates will be increased significantly. Instead of waiting two years to raise rates, some communities will raise monthly user rates in the early stages of the project. Rates can be raised to the level that the engineer says will be necessary to pay for and operate the completed system. All of the revenue collected from the pre-completion rate increase can be applied towards the cost of construction. Communities are surprised how much money can be generated from such an action, and more surprised to learn how much an up-front contribution can lower total borrowing costs.

b. Capital improvement reserve fund

Use your <u>capital improvement reserve fund</u>. Hopefully over the years, your community/county has been making regular contributions to such a fund if you have had an established utility. Typically, a community or county will establish a plan for rehabilitating, upgrading or building a new wastewater system. Such a plan designates what the planned improvements are to be, describes how much an improvement will cost, details how much of the cost the community is willing to pay for up-front, and establishes the amount of revenues that must be transferred regularly to this special account. When it is time to begin a planned project, a planned amount of funds will be available for the project. Any community or county that anticipates it will be developing an improvement project in the next few years should develop a capital improvement plan and establish a capital improvement fund.

c. Community foundations

Increasingly not-for-profit *community foundations* are being formed by communities to promote growth, provide scholarships, assist organizations, and for other purposes. Such foundations could be a vehicle for accumulating funds that eventually could be used for a community improvement project, such as a wastewater system. When a new foundation is created, helping to build a wastewater system could be a stated goal the foundation plans to achieve. If your community already has a foundation, your governing body may have to make their wishes for a wastewater system known. The foundation's directors most likely will not be your governing leaders. Directors of an established foundation may not be thrilled to help build a "sewer system." They may need to be convinced that such a project can be just as important as a park project. Donations to a foundation are normally tax deductible. A foundation does not have to pay income taxes. Patrons of the community, former residents, offspring that have moved away but have ties to the community, and businesses should be told the foundation exists. Hopefully an individual, estate, or business may make a sizable contribution to the foundation. A foundation can also be a place where community organizations can place proceeds collected from fund raising drives. An attorney should be used when setting up a community foundation. The formation documents creating the foundation should state the purpose for why the foundation exists and describe how it will help the community.

2. Public-Private Partnership Arrangements

Sometimes public-private partnerships are used for constructing and/or managing utilities. Much of the following is excerpted from the U.S. EPA's public document: <u>A</u> <u>Guidebook of Financial Tools, Section 4.A., Public-Private Partnership Arrangements</u>; 6/97 EFAB/EFC Guidebook p. 4A-21.

A public-private partnership is a contractual relationship between the public sector (usually a local government) and a private sector company that commits both parties to providing an environmental or other service. The private party can be involved in a variety of ways from designing the public-purpose facility to its financing, construction, operation, maintenance, management, and/or ownership. Although each public-private partnership is unique, most fall into one of five general categories: contract services, turnkey, developer financing, privatization, and merchant facility. There are different responsibilities and benefits associated with each of these types.

To encourage and facilitate private investment and involvement in local infrastructure, including federally grant-funded facilities, Executive Order No. 12803 was issued on May 4, 1992 directing executive agencies to make needed policy and regulatory changes. The order is intended to:

- Assist local privatization initiatives;
- Remove federal regulatory impediments to private sector involvement;
- Relax federal repayment requirements, thus increasing State and local governments' proceeds from privatization arrangements; and
- Protect the public interest by ensuring that privatized assets continue to be used for original purposes and that user charges remain consistent with current federal conditions.
- **a.** <u>Advantages:</u> Depending on the nature of the specific arrangement, a public-private partnership may be able to capitalize on a number of private sector resources. If private financing is used, the burden on public debt capacity can be reduced. If private operation, maintenance, and/or management is used, efficiency savings are generally realized. Private sector procurement and construction methods typically provide significant savings as well. Due to access to sophisticated technologies and specialized expertise, the private sector can sometimes provide services otherwise unavailable to the public sector, or services at a higher level of quality. Private ownership can transfer part or all of the responsibility for financial risk from the public to the private company (risk-sharing). Finally, private sector operations can frequently have a shorter implementation time.
- **b.** *Limitations:* A major concern of governments in public-private partnerships is loss of control. When the public party is not involved in day-to-day operations, it may believe

it does not have the same control over quality, including compliance with environmental standards and permits. Public employees and unions may oppose the public-private partnership due to fears about the loss of jobs. Local governments may not always have the legal authority to enter into contracts with private parties. Tax-exempt and/or other low-cost financing may not be available from federal or State governments for partnership arrangements.

Note: It is important to remember the Kansas Department of Health and Environment strongly prefers all public wastewater treatment systems that discharge, or can discharge, into a water course to be owned by either a county, an incorporated city, or other responsible unit of government. To maintain regulatory oversight and proper compliance of public wastewater systems, KDHE desires to issue operating permits to governing bodies. The ultimate goal of utilizing public-private partnerships is to lower monthly user fees for your consumers and/or to reduce debt for your community. Three things that can be done to do this are (1) lower operation and maintenance costs, (2) reduce the cost of construction, or (3) reduce the cost of borrowing money.

3. Contract Service Agreements

Contract service agreements can be considered as a way to reduce operation and maintenance costs and a way to provide professional management for a system. Service contracts can be part of a lease arrangement and/or an operating agreement. Service contracts can be with a private business, a town, quasi-governmental body, cooperative, or a not-for-profit group. The third party should always be treated like a private business. Savings are achieved through the skill of professionals operating a system efficiently. For a small wastewater system, it is not reasonable to hire a full-time operator to run a system part-time. The governing body of such a system could contract with a neighboring city to have its personnel operate and maintain the system. Additional revenue from the contract would help the neighboring city, and your system's governing body would not have to hire an operator(s). If you use a centrally managed site based treatment sewer system (decentralized), it would be wise to have a service contract with another larger public body such as a city or with a private business such as a septic tank maintenance company or plumbing contractor. A contract service agreement should require the party providing service to be bonded. A service contract agreement is a great way for a county to provide operation and maintenance when it has only one or two sewer districts in the county.

The following are possible service contract agreement arrangements described by the EPA.

a. Contract Services: Operations and Maintenance

A public partner (federal, State, or local government, agency, or authority) contracts with a private partner to provide and/or maintain a specific public environmental service. Examples of the type of service provided include lab testing, auditing, the collection of fines and penalties, solid waste collection and disposal, and the operation and maintenance of water and wastewater treatment facilities and systems. Under the private operation and maintenance option, the public partner retains ownership and overall management of the public facility or system.

b. Contract Services: Operations, Maintenance, and Management

A public partner (federal, State, or local government, agency, or authority) contracts with a private partner to operate, maintain, and manage a facility or system providing a public environmental or other service. Under this contract option, the public partner retains ownership of the public facility or system, but the private party may invest its own capital in the facility or system. Any private investment is carefully calculated in relation to its contributions to operational efficiencies and savings over the term of the contract. Generally, the longer the contract term, the greater the opportunity for increased private investment because there is more time available in which to recoup any investment and earn a reasonable return. . . . Many local governments use this contractual partnership to provide wastewater treatment services. In a well-known case, the City of Indianapolis used it for two large advanced wastewater treatment facilities and saved \$22.6 million dollars in only two years.

c. Long-Term Lease

(Under Executive Order 12803)

Executive Order 12803 directs all federal departments and agencies to support the privatization (sale or long-term lease from a State or local government to a private party) of infrastructure assets (including publicly-owned wastewater treatment works or POTWs) financed in whole or part by the federal government to the extent permitted by law and consistent with originally authorized purposes. The Executive Order also lays out the transfer price distribution and recoupment priorities needed to meet the disposition requirements of federal administrative grant requirements.

d. Agreements to Take Advantage of Private Construction Efficiencies

This is a concept that prescribes taking advantage of private construction methods and procedures. This approach presumes a private company will build a complete system and then transfer the ownership of the assets to a public governing body when the system is completed and ready to be used. Some believe when a contractor has to comply with the construction procedures of public funding agencies and with state laws covering the

construction of public projects, the cost of building a project is higher than a privately built project. The thought process for this approach is a private firm will build a wastewater system, and then the governing body will purchase the new or rehabilitated facility.

Proponents say privately built projects take advantage of less costly procurement procedures and construction efficiencies allows the private sector to build facilities faster and cheaper than comparable publicly built facilities. It is argued contractors can capitalize on such things as faster time frames, lower construction costs, and less costly labor. Private companies have access to outside capital and can take advantage of tax deductions such as depreciation.

Governing bodies anticipating using this type of approach must understand funding agencies may not participate. It is important to ask a funder if they can participate in a transfer of private assets/facilities to a public body. Simply ask the agency if its funds can be used to purchase existing facilities. If you have to fund the purchase of private assets alone, confer with a bond counselor and governmental financial planner.

Before signing any deal with a private entity, an attorney that is shrewd, knowledgeable, and has experience with public-private agreements should review the proposed contract. The background of the private business you are dealing with should be investigated. Agreements to operate a system should be reviewed by appropriate regulatory authorities; start with contacting the Kansas Department of Health and Environment. Agreements must contain language that stipulates the governing body retains ultimate control over how a system is to be operated and maintained. Somewhere the operating agreement should state the system will be operated and maintained in a manner that (1) protects the health and safety of the public and (2) complies with all environmental standards and rules. Make sure any company that you contract with can be bonded for the construction and/or for operating a system.

Finally when weighing whether to use this approach, remember rules and procedures for publicly built projects have been adopted for good reasons. Ask what rules are designed to protect your community, the public, and the environment. Ask if you can develop similar safeguards if you use a private construction arrangement. Ask if cost savings outweigh any exposure you may have with a private company if things go wrong. Remember knowledge is key to making this approach work.

e. Build/Operate/Transfer or Build/Transfer/Operate

Under the Build/Operate/Transfer (BOT) option, the private partner builds a facility to the specifications agreed to by the public agency (usually under a turnkey arrangement), operates the facility for a specified time period under a contract or franchise agreement with the agency, and then transfers the facility to the agency at the end of the specified

period of time. In most cases, the private partner will also provide some, or all, of the financing for the facility, so the length of the contract or franchise must be sufficient to enable the private partner to realize a reasonable return on its investment through user charges. At the end of the franchise period, the public partner can assume operating responsibility for the facility, contract the operations to the original franchise holder, or award a new contract or franchise to a new private partner. The Build/Transfer/Operate (BTO) model is similar to the BOT model, except that the transfer to the public owner takes place at the time that construction is completed rather than at the end of the franchise period.

f. Turnkey

Under a turnkey arrangement, a public agency will contract with a private investor/vendor to design and build a complete facility in accordance with specified performance standards and criteria agreed to between the agency and the vendor. The private developer will commit to build the facility for a fixed price and will absorb the construction risk of meeting that price commitment. Generally, in a turnkey transaction, the private partners will use fast-track construction techniques (such as design-build) and will not be bound by traditional public sector procurement regulations. This combination often enables the private partner to complete the facility in significantly less time and for less cost than could be accomplished under traditional construction techniques. In a turnkey transaction, financing and ownership of the facility can rest with either the public or private partner. For example, the public agency might provide the financing, with the attendant costs and risks. Alternatively, the private party might provide the financing capital, generally in exchange for a long-term contract to operate the facility.

g. <u>Developer Financing</u>

Under developer financing, the private party (usually a real estate developer) finances the construction or expansion of an environmental facility in exchange for the right to build residential housing, commercial stores, and/or industrial facilities. The private developer contributes capital and may operate the facility under the oversight of the local government. The developer gains the right to use the facility and may receive future income from user fees. While developers may in rare cases build a facility, more typically they are charged a fee or required to purchase capacity in an existing facility. This payment is used to expand or upgrade the facility. Developer financing arrangements are often called capacity credits, sewer access rights, impact fees, or exactions. Developer financing may be voluntary or involuntary depending on the specific local circumstances.

h. Lease/Develop/Operate or Build/Develop/Operate

Under these partnership arrangements, the private party leases or buys a facility from a public agency, invests its own capital to renovate, modernize and/or expand the facility, and then operates it under a contract with the public agency.

<u>The investment of capital from private sources</u> is often referred to as privatization. The complete private ownership of a public wastewater system in Kansas is rare. State regulatory agencies steer away from issuing operating permits to private entities that own a public wastewater system. KDHE's position is that a governing body should own such systems. Counties, cities, townships, and improvement districts can be held accountable for environmental problems. Also governing bodies can use their taxing authority to attain revenues to correct environmental problems.

Private investment is usually used to bring outside capital into a project. Communities with high debts may find this approach to be attractive. The private entity often provides the capital to build a system, and the community pays for the system through installments.

The likelihood of a public wastewater system being wholly owned and operated by a private entity in Kansas is remote at this time. However, there may be possibilities regarding leasing or partial ownership. State and local regulatory agencies and funders may consider a well written lease agreement to be an adequate substitute for ownership providing the governing body has control over system management, ownership, and can be held accountable for environmental mishaps. If you are interested in the concept of leasing, the Kansas Department of Health and Environment should be contacted for guidance.

A centrally-managed site-based treatment wastewater system that has a central secondary treatment facility for effluent seems to be the best opportunity for using partial private ownership. Conceivably the collection system and the secondary treatment facility would be owned by the community. The primary treatment facilities, onsite septic tanks, could be owned by a private business such as a septic tank service company. The septic tank service company would have an agreement with the governing body that they will maintain and operate the septic system as the governing body desires. Mostly the service agreement would be for an extended period. The private company would agree to sell the septic tanks to the community when it has fully depreciated the tanks. The community would then purchase a less costly, but useful, septic tank from the business. After the ownership transfer is completed, the governing body would operate the system itself or have a private firm continue providing service. The following are two possibilities to consider.

i. Lease/purchase

A lease/purchase is an installment-purchase contract. Under this model, the private sector finances and builds a facility which it then leases to a public agency. The public agency makes scheduled lease payments to the private party. The public agency accrues equity in the facility with each payment. At the end of the lease term, the public agency owns the facility or purchases it at the cost of any remaining unpaid balance in the lease. Under this arrangement, the facility may be operated by either the public agency or the private developer during the term of the lease.

j. Privatization

In privatization, the public sector (usually a local or State government) makes the decision to provide an environmental service and looks to the private sector for help in meeting that need. The private sector contracts to design, build, own and operate the desired public-purpose environmental facility. Generally, the private party will partially or totally finance the operation. They may, however, access tax-exempt financing available through the State for environmental and other public-purpose projects.