

DECtalk® Software

Installation Guide

April 2001

This guide describes how to install DECtalk® Software.

Revision / Update Information:	This document supersedes the <i>DECtalk Software Installation Guide</i> , Version 4.6.
Operating System:	Microsoft Windows 95/98/ME/NT/2000 Microsoft Windows CE/Pocket PC Red Hat Linux Version 5.0 or higher Compaq Tru64 UNIX Version 4.x
Software Version:	DECtalk Software Version 4.61



April 2001

The information in this publication is subject to change without notice. Force Computers, Inc. reserves the right to make changes without notice to this, or any of its products, to improve reliability, performance, or design.

FORCE COMPUTERS, INC. SHALL NOT BE LIABLE FOR TECHNICAL OR EDITORIAL ERRORS OR OMISSIONS CONTAINED HERIN, NOR FOR INDIRECT, SPECIAL, INCIDENTAL, OR CONSEQUENTIAL DAMAGES RESULTING FROM THE FURNISHING, PERFORMANCE, OR USE OF THIS MATERIAL. THIS INFORMATION IS PROVIDED "AS IS" AND FORCE COMPUTERS, INC. EXPRESSLY DISCLAIM ANY AND ALL WARRANTIES, EXPRESS, IMPLIED, STATUTORY, OR OTHERWISE, INCLUDING WITHOUT LIMITATION, ANY EXPRESS, STATUTORY, OR IMPLIED WARRANTY OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, OR NON-INFRINGEMENT.

This publication contains information protected by copyright. This publication shall not be reproduced, transmitted, or stored in a retrieval system, nor its contents used for any purpose, without the prior written consent of Force Computers, Inc.

Force Computers, Inc. assumes no responsibility for the use of any circuitry other than the circuitry that is part of a product of Force Computers, Inc. Force Computers, Inc. does not convey to the purchaser of the product described herein any license under the patent rights of Force Computers, Inc. nor the rights of others.

The software described in this guide is furnished under a license agreement or nondisclosure agreement. The software may be used or copied only in accordance with the terms of the agreement.

Copyright © 2000, 2001 by Force Computers, Inc. Certain portions © 1997, 1998, 1999 Compaq Computer Corporation. All rights reserved.

The Force logo and DECTalk are trademarks of Force Computers, Inc.

Compaq is a registered trademark of Compaq Computer Corporation. Tru64 is a trademark of Compaq Information Technologies Group, L.P.

Intel is a trademark of Intel Corporation.

Linux is a registered trademark of Linus Torvalds.

Microsoft, Windows, Windows 95, Windows 98, Windows ME, Windows NT, Windows 2000, and Windows CE are registered trademarks of Microsoft Corporation.

Motif is a registered trademark of the Open Software Foundation, Inc.

Red Hat is a registered trademark of Red Hat Software, Inc.

SoundBlaster is a registered trademark of Creative Labs, Inc.

UNIX and The Open Group are trademarks of The Open Group.

Other product names mentioned herein may be trademarks and/or registered trademarks of their respective companies.

Contents

Preface	ix
Purpose and Audience	ix
Structure	ix
What's New in DECtalk Software V4.61?	ix
What's New in DECtalk Software V4.6?	x
Online Help	xi
FAQs: Frequently Asked Questions about DECtalk Software	xii
Conventions	xiv
Chapter 1 — Installing DECtalk Software for Windows 9x/ME/NT/2000	1-1
Preparing for Installation	1-2
Hardware Requirements	1-2
Audio Output Device.....	1-2
Required Disk Space and Software.....	1-3
Installing DECtalk Software	1-4
Starting the Installation	1-4
Selecting Which Kit to Install.....	1-6
Reading the License Agreement	1-7
Reading the Release Notes	1-7
Choosing the Installation Destination Directory.....	1-8
Starting the DECtalk Software for Windows Installation.....	1-9
Entering Customer Information	1-9
Selecting a Full or Custom Installation	1-10
Selecting Components for a Custom Installation	1-11
Naming the Program Folder	1-13
Starting the File Transfers.....	1-14

Selecting the Default Language.....	1-15
Completing the Installation	1-16
Modifying, Repairing, or Removing a DECtalk Windows SDK Installation	1-18
Modifying the Current Installation	1-20
Repairing the Current Installation	1-20
Removing the Current Installation	1-20
Completing the Installation Maintenance	1-21
Installing SAPI Version 5 Support (Optional).....	1-22
Starting the Installation.....	1-22
Selecting Which Kit to Install	1-25
Starting the DECtalk SAPI Version 5 Installation	1-26
Reading the License Agreement	1-27
Selecting a Complete or Custom Installation	1-28
Customizing the Installation.....	1-29
Starting the File Transfers.....	1-30
Completing the Installation	1-31
Modifying, Repairing, or Removing a DECtalk SAPI V5 SDK Installation	1-32
Modifying the Current Installation	1-34
Repairing the Current Installation	1-34
Removing the Current Installation	1-34
Completing the Installation Maintenance	1-35
Displaying Documentation	1-36
Solving Installation Problems	1-37
Chapter 2 — Installing DECtalk Software for Windows CE	2-1
Preparing for Installation.....	2-3
Hardware Requirements	2-3
Audio Output Device	2-4
Required Disk Space and Software	2-4
Installing DECtalk Software.....	2-5
Starting the Installation.....	2-5
Selecting Which Kit to Install	2-7

Reading the License Agreement	2-8
Reading the Release Notes	2-8
Choosing the Installation Destination Directory.....	2-9
Starting the DECTalk Software for Windows CE Installation.....	2-10
Entering Customer Information	2-10
Selecting Full, By-Platform, or Custom Installation.....	2-11
Selecting Platforms for By-Platform Installation.....	2-12
Selecting Components for a Custom Installation	2-13
Naming the Program Folder.....	2-15
Starting the File Transfers.....	2-16
Completing the Installation.....	2-17
Configuring the Windows CE Target System.....	2-18
Modifying, Repairing, or Removing the Current Installation	2-19
Modifying the Current Installation.....	2-21
Repairing the Current Installation.....	2-21
Removing the Current Installation.....	2-21
Completing DECTalk Installation Maintenance	2-22
Displaying Documentation.....	2-23
Solving Installation Problems.....	2-24
Chapter 3 — Installing DECTalk Software for Linux	3-1
Preparing for Installation	3-2
Extract the Installation Materials	3-2
Release Notes	3-3
Hardware Requirements	3-3
Audio Output Device.....	3-3
Required Disk Space and Software.....	3-3
Installing DECTalk Software	3-5
Reviewing the List of Target Installation Directories	3-5
Running the Installation Script.....	3-5
Displaying Documentation.....	3-7
Solving Installation Problems.....	3-8

Chapter 4 — Installing DECtalk Software for Tru64 UNIX	4-1
What's the Difference Between the DECtalk Software Runtime Kit and the DECtalk Software Development Kit?.....	4-2
License Requirements	4-2
Installing DECtalk Runtime Software for Tru64 UNIX	4-3
Preinstallation Tasks	4-4
Accessing the Release Notes	4-4
Registering Your Software Licenses	4-4
Checking the Software Distribution Kit	4-6
Meeting Hardware Requirements.....	4-8
Meeting Software Requirements.....	4-8
Checking Current Disk Space	4-8
Increasing Disk Space by Using Alternative Disks	4-9
Installation Procedure	4-10
Using the CD-ROM Distribution Media	4-10
Using an RIS Distribution Area	4-11
Starting the Installation Procedure	4-11
Selecting Subsets.....	4-12
Stopping the Installation	4-15
Post-Installation Tasks	4-15
Running the Installation Verification Procedure	4-16
Deleting DECtalk Software from Your System.....	4-16
Displaying Documentation	4-17
Correcting Problems During Product Installation	4-17
Reporting Problems.....	4-18
Installing DECtalk Software Development Kit for Tru64 UNIX.....	4-19
Preinstallation Tasks	4-20
Accessing the Release Notes	4-20
Registering Your Software Licenses	4-20
Checking the Software Distribution Kit	4-22
Meeting Hardware Requirements.....	4-24
Meeting Software Requirements.....	4-24
Checking Current Disk Space	4-24
Increasing Disk Space by Using Alternative Disks	4-25

Installation Procedure	4-25
Using the CD-ROM Distribution Media	4-26
Using an RIS Distribution Area.....	4-26
Starting the Installation Procedure	4-27
Selecting Subsets.....	4-28
Stopping the Installation.....	4-30
Post-Installation Tasks.....	4-31
Running the Installation Verification Procedure	4-31
Deleting DECtalk Software from Your System.....	4-32
Displaying Documentation	4-32
Correcting Problems During Product Installation	4-33
Reporting Problems.....	4-34

Index.....	1
------------	---

Figures

<i>Figure 1-1 DECtalk InstallShield Wizard Welcome Window</i>	<i>1-5</i>
<i>Figure 1-2 DECtalk Products Installation Setup Window.....</i>	<i>1-6</i>
<i>Figure 1-3 DECtalk Choose Destination Location Window.....</i>	<i>1-8</i>
<i>Figure 1-4 DECtalk InstallShield Wizard Welcome Window (95/98/ME/NT/2000).....</i>	<i>1-9</i>
<i>Figure 1-5 DECtalk Setup Type Window (95/98/ME/NT/2000).....</i>	<i>1-10</i>
<i>Figure 1-6 DECtalk Select Components Window (95/98/ME/NT/2000)</i>	<i>1-12</i>
<i>Figure 1-7 DECtalk Select Program Folder Window (95/98/ME/NT/2000).....</i>	<i>1-13</i>
<i>Figure 1-8 DECtalk Start Copying Files Window (95/98/ME/NT/2000)</i>	<i>1-14</i>
<i>Figure 1-9 DECtalk Setup for Default Language Window (95/98/ME/NT/2000)</i>	<i>1-15</i>
<i>Figure 1-10 DECtalk InstallShield Wizard Complete Window (95/98/ME/NT/2000).....</i>	<i>1-17</i>
<i>Figure 1-11 DECtalk Setup Maintenance Welcome Window (95/98/ME/NT/2000)</i>	<i>1-19</i>
<i>Figure 1-12 DECtalk Setup Maintenance Complete Window (95/98/ME/NT/2000)</i>	<i>1-21</i>
<i>Figure 1-13 DECtalk InstallShield Wizard Welcome Window</i>	<i>1-24</i>
<i>Figure 1-14 DECtalk Products Installation Setup Window.....</i>	<i>1-25</i>
<i>Figure 1-15 DECtalk InstallShield Wizard Welcome Window (SAPI 5)</i>	<i>1-26</i>
<i>Figure 1-16 DECtalk Setup Type Window (SAPI 5)</i>	<i>1-28</i>
<i>Figure 1-17 DECtalk Custom Setup Window (SAPI 5).....</i>	<i>1-29</i>
<i>Figure 1-18 DECtalk Ready to Install the Program Window (SAPI 5).....</i>	<i>1-30</i>
<i>Figure 1-19 DECtalk InstallShield Wizard Complete Window (SAPI 5).....</i>	<i>1-31</i>
<i>Figure 1-20 DECtalk Program Maintenance Welcome Window (SAPI 5).....</i>	<i>1-32</i>
<i>Figure 1-21 DECtalk Program Maintenance Window (SAPI 5).....</i>	<i>1-33</i>

<i>Figure 1-22 DECTalk Program Maintenance Complete Window (SAPI 5)</i>	1-35
<i>Figure 2-1 DECTalk InstallShield Wizard Welcome Window</i>	2-6
<i>Figure 2-2 DECTalk Products Installation Setup Window</i>	2-7
<i>Figure 2-3 DECTalk Choose Destination Location Window</i>	2-9
<i>Figure 2-4 DECTalk InstallShield Wizard Welcome Window (CE)</i>	2-10
<i>Figure 2-5 DECTalk Setup Type Window (CE)</i>	2-11
<i>Figure 2-6 DECTalk Setup Platforms Window (CE)</i>	2-12
<i>Figure 2-7 DECTalk Select Components Window (CE)</i>	2-14
<i>Figure 2-8 DECTalk Select Program Folder Window (CE)</i>	2-15
<i>Figure 2-9 DECTalk Start Copying Files Window (CE)</i>	2-16
<i>Figure 2-10 DECTalk Setup Maintenance Welcome Window (CE)</i>	2-20
<i>Figure 2-11 DECTalk Setup Maintenance Complete Window (CE)</i>	2-22

Purpose and Audience

This guide describes how to install DECtalk® Software Development Kits (SDKs) for:

- Windows 95, 98, ME, NT, and 2000
- Windows CE and Pocket PC
- Linux
- Tru64 UNIX

In addition, this guide describes how to install the DECtalk runtime software on a Tru64 UNIX system.

The instructions documented in this guide do not cover basic user information for the operating system. Only information specific to installing DECtalk Software is included.

Structure

The guide is organized as follows:

- | | |
|------------------|--|
| Chapter 1 | Installing DECtalk Software for Windows 95/98/ME/NT/2000 |
| Chapter 2 | Installing DECtalk Software for Windows CE |
| Chapter 3 | Installing DECtalk Software for Linux |
| Chapter 4 | Installing DECtalk Software for Tru64 UNIX |

What's New in DECtalk Software V4.61?

DECtalk Software V4.61 contains the following new features:

- Windows CE support extended to palm-size PCs and pocket PCs.
- Installation tested on Windows ME.
- Reduced footprint sizes for all platforms.

- Unified phoneme set for all supported languages, allowing you to specify phonemes from different languages within the context of your current language.
- Support for Version 5.0 of the Microsoft Speech API (SAPI) on Windows 98, Windows ME, Windows NT, and Windows 2000 platforms.
- Beta support for the French language.
- Enhanced German.
- Supplemental foreign-language dictionary for German, allowing you to include foreign phrases in German speech.
- Addition of a Hebrew complement phoneme set.
- Support for Windows CE Agent, an automatic registry update application for Windows CE developers.

What's New in DECTalk Software V4.6?

DECTalk Software V4.6 contains the following new features:

- Installation tested on Windows 98 and Windows 2000.
- Support for Linux.
- Support for the German language.
- Disabled license error pop-up window from the DECTalk Software API (DAPI) engine.
- Significantly increased compliance with the Microsoft Speech API (SAPI); see APPENDIX3.TXT.
- Enhanced Latin American and Castilian Spanish.
- Windows CE support, which includes a static version of `windic.exe` that allows the Windows host to support a user-defined dictionary, and full registry support.
- Y2K compliance.
- Over 170 bugs fixed, including the following:
 - Various application or system hangs or crashes caused by data path, synchronization, and dictionary failures corrected.
 - User dictionary compiler failures corrected.

- Wave file headers corrected.
- Use of extended ASCII characters corrected.
- New in-line command **Say filtered-letter** added.
- Number processing changes automatically by language.
- Memory leaks corrected.
- Main dictionary wordclass and function words added.
- Word and number stressing corrected.
- Diphthong, phoneme, homograph, and allophone processing corrected.

Online Help

On Windows host systems, DECTalk Software online help is a component of Windows Help. The DECTalk Windows Help is part of the application and is easily accessed from any of the DECTalk applets or from the Help icon in the DECTalk program group. You can find specific information in Help by using keyword searches and the index. Windows Help has a powerful cross-referencing facility that allows you to access many related topics in the same session. See the *Displaying Documentation* sections for Windows 95/98/ME/NT/2000 and Windows CE for instructions.

On Linux and Tru64 UNIX systems, DECTalk Software online help is provided as HTML Help and reference (man) pages. You access online help using a browser application for the HTML Help or the UNIX **man** command for the reference pages. See the *Displaying Documentation* sections for Linux and Tru64 UNIX for instructions.

The DECTalk Software online help includes guide and reference information about the following DECTalk features:

- **DECTalk Software applets**
 - Select DECTalk Software and then the DECTalk Applet Master Index.
- **DECTalk Software API functions**
 - Select the Programmer's Guide and then the Introduction to the DECTalk Software API.
 - Select the Reference Guide and then DECTalk Software API Functions.
- **DECTalk Software in-line commands**

Select the Reference Guide and then one of the following:

 - DECTalk Software In-Line Commands.
 - Using In-Line Commands.

FAQs: Frequently Asked Questions about DECtalk Software

Q: What is DECtalk Software?

A: DECtalk Software is software that converts ASCII text into speech without the use of special or proprietary hardware.

Q: What hardware does it support? Does it work or require a DECtalk hardware device?

A: Although DECtalk Software does not need any specialized hardware (specialized hardware is defined as boards and devices released over the years with other DECtalk products) for the text-to-speech conversion process, you must have a sound card installed or built into your computer.

Q: Who is DECtalk Software for?

A: DECtalk Software is for users and developers.

For users, there are the Dtsample (Windows only) and Speak graphical applets, the Say command-line applet, and the User Dictionary Build Tool. These provide a runtime environment in which users can speak text files directly using DECtalk applications or, in the Windows 95/98/ME/NT/2000 environment, through other applications using a Text-to-Speech server.

For developers, DECtalk additionally provides an API and sample source code that can be used to incorporate text-to-speech synthesis into Windows, Linux, or Tru64 UNIX applications.

Q: How long does it take DECtalk Software to start speaking?

A: DECtalk Software is optimized for quick startup. However, speaking start time is hardware (processor type) and software (operating system) dependent.

Q: Can DECtalk Software be used in a telephony environment.

A: Yes, DECtalk Software supports 8-bit mu-law synthesis and a multi-instance environment with the proper licenses.

Q: Can I create my own DECtalk voice?

A: Yes! In addition to the nine predefined voices, you can create a customized voice of your own. See Chapter 5 in the *DECtalk Software Reference Guide*.

Q: What is the difference between the DECtalk Software Development Kit (SDK) and other DECtalk products?

A: The DECtalk family of products is listed in the following table.

Product	Target Operating System	Provides:
DECtalk Software Development Kit	Windows 95/98/ME/NT/2000	API, in-line commands, OLE, SAPI, TTS server, dictionary facilities, sample programs, sample source code
	Windows CE	API, in-line commands, OLE, dictionary facilities, sample programs, sample source code
	Linux	API, in-line commands, dictionary facilities, sample programs, sample source code
	Tru64 UNIX	API, sample source code
DECtalk Software Runtime Kit for Tru64 UNIX	Tru64 UNIX	In-line commands, dictionary facilities, sample programs
DECtalk PC2	DOS, Windows	Hardware-assisted synthesis
DECtalk Express	Custom	Box with a serial interface and speaker

Conventions

The following conventions are used in this guide:

Convention	Meaning
enter	<i>Enter</i> means type the required information and press the Enter key.
mouse	<i>Mouse</i> refers to any pointing device, such as a mouse, a puck, or a stylus.
MB1	<i>MB1</i> indicates the left mouse button.
click	<i>Click</i> means to press and release MB1.
Double click	<i>Double click</i> means to press and release MB1 twice in rapid succession without moving the mouse.
drag	The phrase <i>drag</i> means to press and hold MB1, move the mouse, and then release MB1 when the pointer is in the desired position.
Ctrl/x	Press the Ctrl key while you press another key.
Menu →Command	The right arrow key indicates an abbreviated instruction for choosing a command from a menu. For example, <i>File →Exit</i> means pull down the File menu, move the pointer to the Exit command, and release MB1.
Courier type	<i>Courier type</i> indicates text that is typed or displayed on the screen. This is most often used for program code examples.
User Input	Boldface type in interactive examples indicates information you enter from the keyboard. For example: A:> SETUP
XX YY and XXn YYn	In DECtalk Software in-line command syntax, XX and YY indicate options and parameters. When more than one choice of options or parameters is allowed, the symbol XXn or YYn with n replaced by a numeral indicates each option or parameter in the symbolic representations, such as [:phoneme XX1 XX2 YY]. Note that the number of characters in the symbolic representation does NOT represent the number of characters allowed in the actual option or parameter name.
DD and DDn	In DECtalk Software in-line command syntax, DD indicates a decimal (base 10) value. When more than one decimal values are allowed, the symbol DDn with n replaced by a numeral represents each allowed value, such as [:volume XX DD1 DD2]. Note that the number of characters in the symbolic representation does NOT represent the number of characters allowed in the actual decimal value.

Conventions used in API functions

Italics Italic text emphasizes important information.

Unless you are otherwise instructed, press **Enter** after typing responses to command prompts.

Chapter 1 — Installing DECtalk Software for Windows 9x/ME/NT/2000

This chapter provides information you need to install the DECtalk Software Development Kit (SDK) for Windows 95/98/ME/NT/2000 on a host computer system.

Specific topics include:

- Preparing for installation
- Installing DECtalk Software
- Installing SAPI Version 5 support (optional)
- Modifying, repairing, or removing the current installation
- Displaying documentation
- Solving installation problems

The DECtalk Software documentation is provided in PDF and other formats on the distribution CD-ROM. After a successful installation, DECtalk Software online help is accessible in the form of Windows Help. For more information, see *Displaying Documentation*.

Preparing for Installation

DECtalk Software is installed from the installation media shipped with the product. The installation should take you no longer than five minutes to complete. You can launch the InstallShield Wizard for DECtalk Software automatically, by inserting the installation CD-ROM, or manually, by using Windows Explorer or the Windows Run or Command Prompt facilities.

Before installing DECtalk Software:

- Make sure that all prerequisite hardware and software components are installed on your system.
- If another version of DECtalk Software is already installed, close any running DECtalk applications and uninstall the existing DECtalk Software.

During DECtalk Software installation, the InstallShield Wizard will display a License Agreement window, which explains the terms of the DECtalk Software license agreement, and a Readme window, which provides the latest information about the DECtalk Software product. **Please read the complete contents of both windows carefully and make sure that you understand them before you continue.**

Hardware Requirements

DECtalk Software for Windows requires an Intel-based Windows host system with adequate disk space for installation and a standard audio sound card.

DECtalk Software performance is dependent on your system having enough computational power to perform all the computations involved in text-to-speech conversion. See the release notes for a list of the latest supported systems.

Note

DECtalk Software performance can be affected in a heavily loaded multitasking environment where DECtalk Software could become starved for computational power and will not speak continuously. There might be pauses in output for any application running on such a system.

Audio Output Device

Your system must be configured with an audio device and appropriate driver that support 8-bit or 16-bit data format at an 11.025 kHz sample rate. You can

install DECtalk Software without an audio device present and capture .wav audio files; however, an audio device must be present to actually have DECtalk Software speak text.

Required Disk Space and Software

DECtalk Software for Windows requires:

- A minimum of 31 MB of disk space for a Full Installation; however, if you specify a Custom Installation to the InstallShield Wizard, you can monitor the disk space required and make adjustments (see *Selecting Components for a Custom Installation*)
- An additional 1.8 MB of disk space if you install the optional DECtalk SAPI Version 5 SDK for Windows 98, ME, NT or 2000
- Windows 95, Windows 98, Windows ME, Windows NT, or Windows 2000 running on the host system

Installing DECTalk Software

You can start the DECTalk Software installation automatically, by inserting the installation CD-ROM, or manually, from the Windows Explorer or from the Windows Run or Command Prompt dialog boxes. Starting the installation activates the InstallShield Wizard for DECTalk Software, which will guide you through the necessary steps and decisions.

If a previous version of DECTalk Software exists on your system, the new installation overwrites it.

Note

Before installing a new version of DECTalk Software, close any running DECTalk applications and uninstall any existing DECTalk Software.

This Software Development Kit (SDK) is provided on a single CD-ROM that lets you install any or all of the supported languages, including United States English, United Kingdom English, Castilian Spanish, Latin American Spanish, German, and French.

Starting the Installation

To start the DECTalk Software installation, insert the installation CD-ROM and wait for the InstallShield Wizard for DECTalk Software to appear.

If the InstallShield Wizard does not appear automatically, run the program `setup.exe` from the top level of the installation CD-ROM. You can do this in one of the following ways:

- In the Windows Explorer, select the appropriate drive and click program `setup.exe`.
- In the Windows Run or Command Prompt dialog box, run `setup.exe` with a command such as:

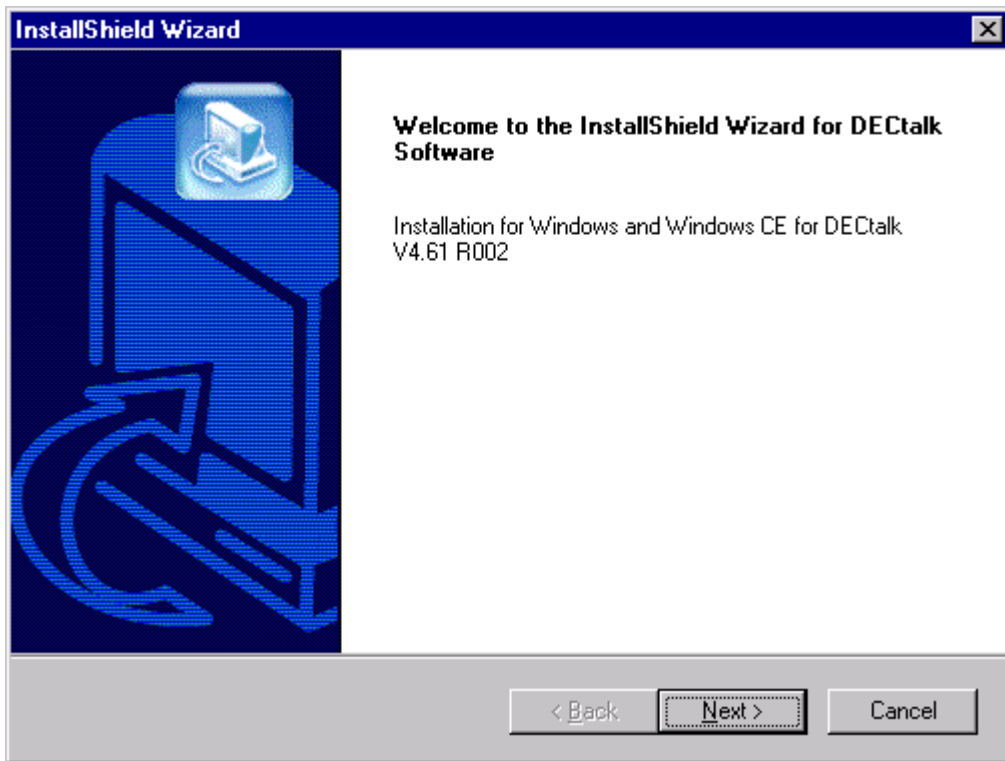
```
f:\setup.exe
```

where `f` is replaced by the correct letter for your CD-ROM drive.

When activated, the InstallShield Wizard for DECTalk Software displays the DECTalk InstallShield Wizard Welcome window, shown in *Figure 1-1*.

To proceed with the DECTalk Software installation, click the **Next** button.

Figure 1-1 DECTalk InstallShield Wizard Welcome Window



Selecting Which Kit to Install

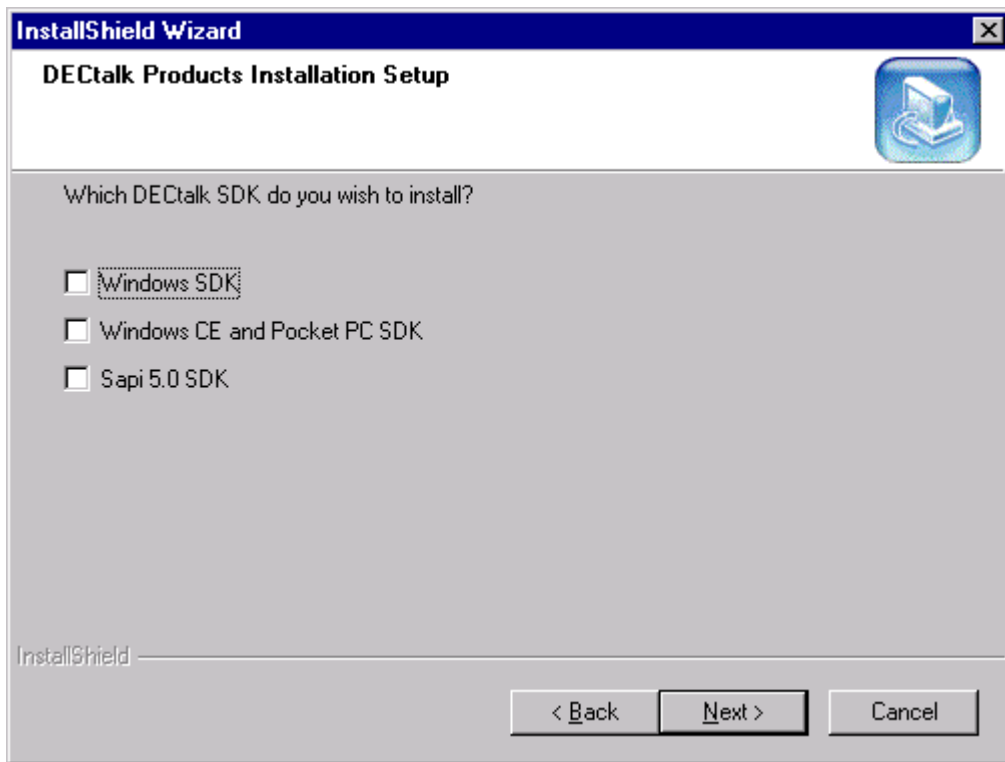
Next, the InstallShield Wizard displays the DECtalk Products Installation Setup window, shown in *Figure 1-2*.

Select **Windows SDK** to install the DECtalk Software Development Kit (SDK) for Windows 95, 98, ME, NT, or 2000.

You can additionally select **Sapi 5.0 SDK**, **Windows CE and Pocket PC SDK**, or both. For details about those installation procedures, see *Installing SAPI Version 5 Support (Optional)* and the chapter *Installing DECtalk Software for Windows CE*.

To proceed with the DECtalk Software installation, click the **Next** button.

Figure 1-2 DECtalk Products Installation Setup Window



Reading the License Agreement

Next, the InstallShield Wizard displays a License Agreement window, which explains the terms of the DECtalk Software license agreement. Please read the license agreement carefully and completely.

The License Agreement window asks if you accept all the terms of the license agreement. To install DECtalk Software, you must understand and choose to accept the license agreement terms. To accept the license agreement, click the **Yes** button.

If you do not accept the license agreement, click **No**, which will terminate the installation.

Reading the Release Notes

Next, the InstallShield Wizard displays a Readme window, containing release notes that detail the latest information about the DECtalk Software product. Please read the release notes carefully and completely.

To proceed with the DECtalk Software installation, click the **Next** button.

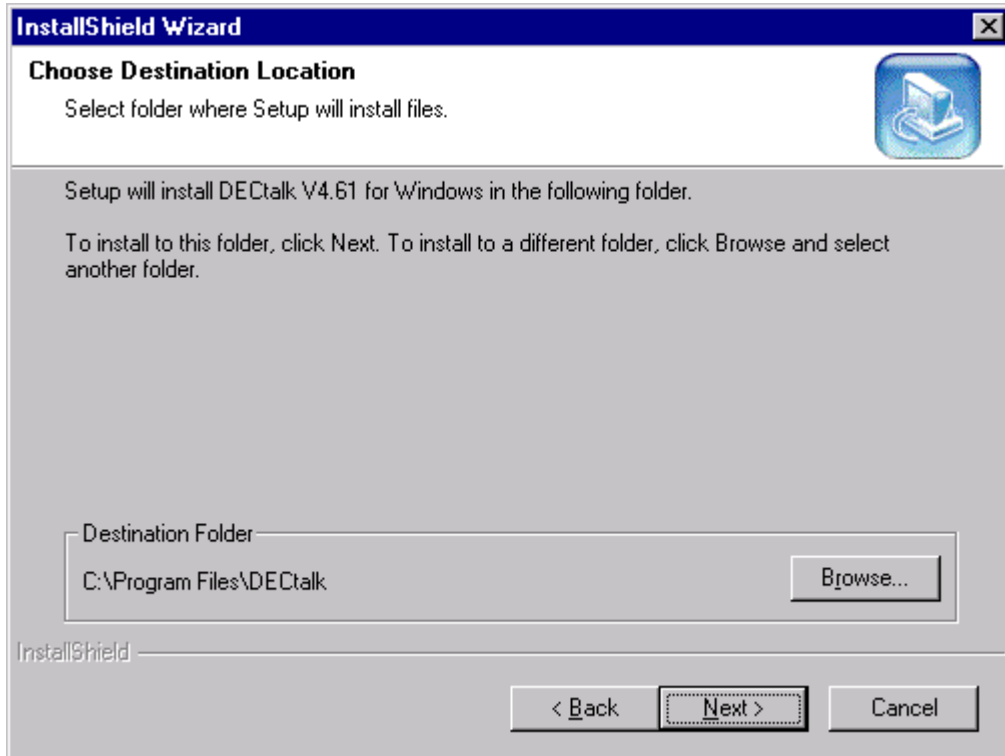
Choosing the Installation Destination Directory

Next, the InstallShield Wizard displays the DECtalk Choose Destination Location window, shown in *Figure 1-3*.

Select the directory to which you want to install DECtalk Software. You can accept the default installation directory, C:\Program Files\DECtalk, or click the **Browse** button and select another folder.

To proceed with the DECtalk Software installation, click the **Next** button.

Figure 1-3 DECtalk Choose Destination Location Window

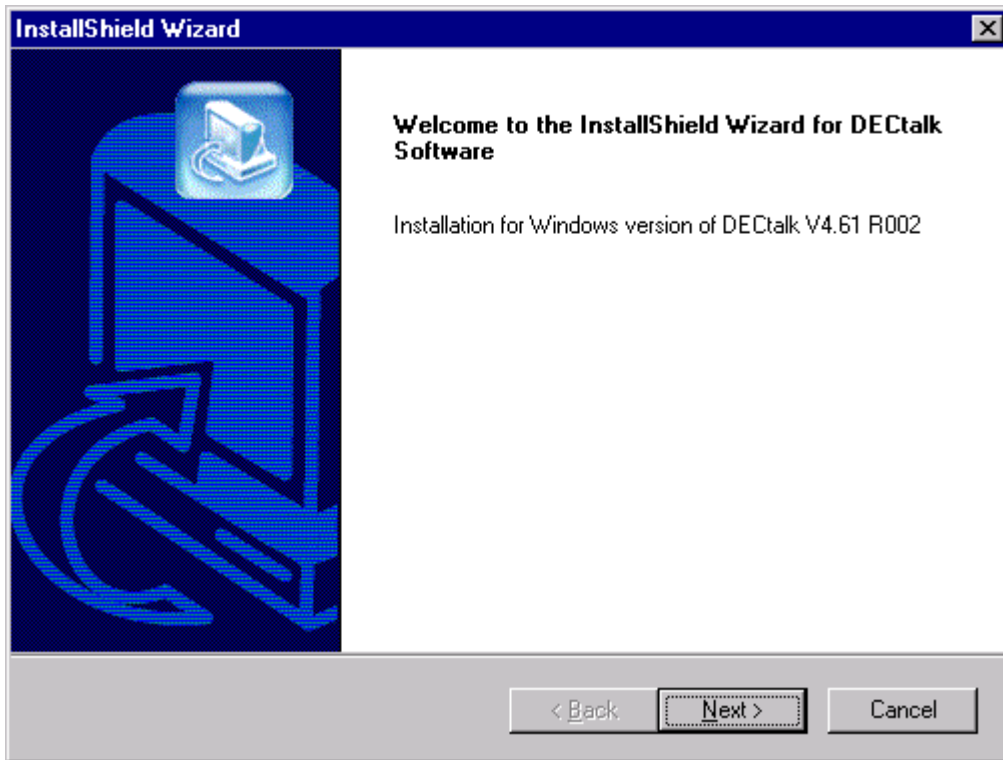


Starting the DECTalk Software for Windows Installation

If you selected to install **Windows SDK**, the InstallShield Wizard displays a welcome window to indicate that Windows SDK installation has begun, as shown in *Figure 1-4*.

To proceed with the DECTalk Software for Windows installation, click the **Next** button.

Figure 1-4 DECTalk InstallShield Wizard Welcome Window (95/98/ME/NT/2000)



Entering Customer Information

Next, the InstallShield Wizard displays a Customer Information window. You can fill in the User Name and Company Name fields as appropriate.

To proceed with the DECTalk Software for Windows installation, click the **Next** button.

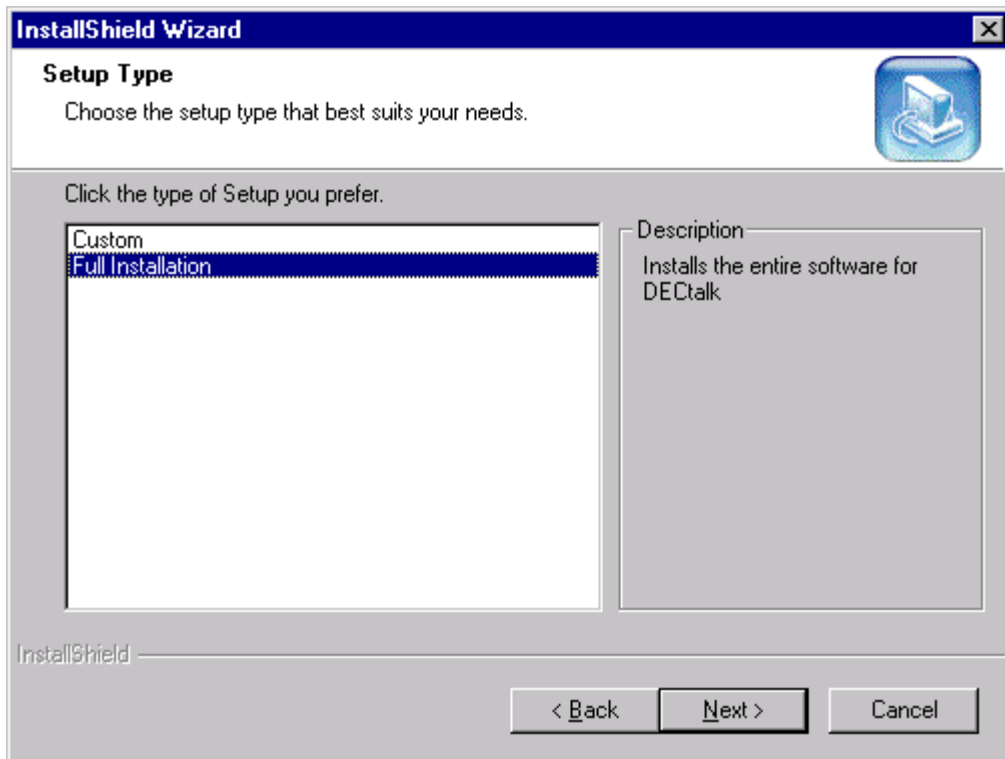
Selecting a Full or Custom Installation

Next, the InstallShield Wizard displays the DECtalk Setup Type window, shown in *Figure 1-5*.

Select either a **Full Installation**, the default, which will install all languages, all sample programs, help files, and documentation; or a **Custom** installation that allows you to include some components and exclude others.

To proceed with the DECtalk Software for Windows installation, click the **Next** button.

Figure 1-5 DECtalk Setup Type Window (95/98/ME/NT/2000)



Selecting Components for a Custom Installation

If you selected a **Custom** installation, the InstallShield Wizard displays the DECtalk Select Components window, shown in *Figure 1-6*.

By checking and unchecking boxes, select the DECtalk Software components to be included or excluded from your installation. As you include or exclude components in the window, the Space Required field is updated to reflect the memory requirements for your selected components.

The **License Key** box shown in *Figure 1-6* pertains to the `licenin3` program, which you run immediately after the installation to increment the DECtalk license/key count from 1 to 4. If you would like to be able to run `licenin3` from your installation directory rather than from the installation CD-ROM, the **License Key** box must be selected.

When you are ready to proceed with the DECtalk Software installation, click the **Next** button.

Figure 1-6 DECTalk Select Components Window (95/98/ME/NT/2000)



Naming the Program Folder

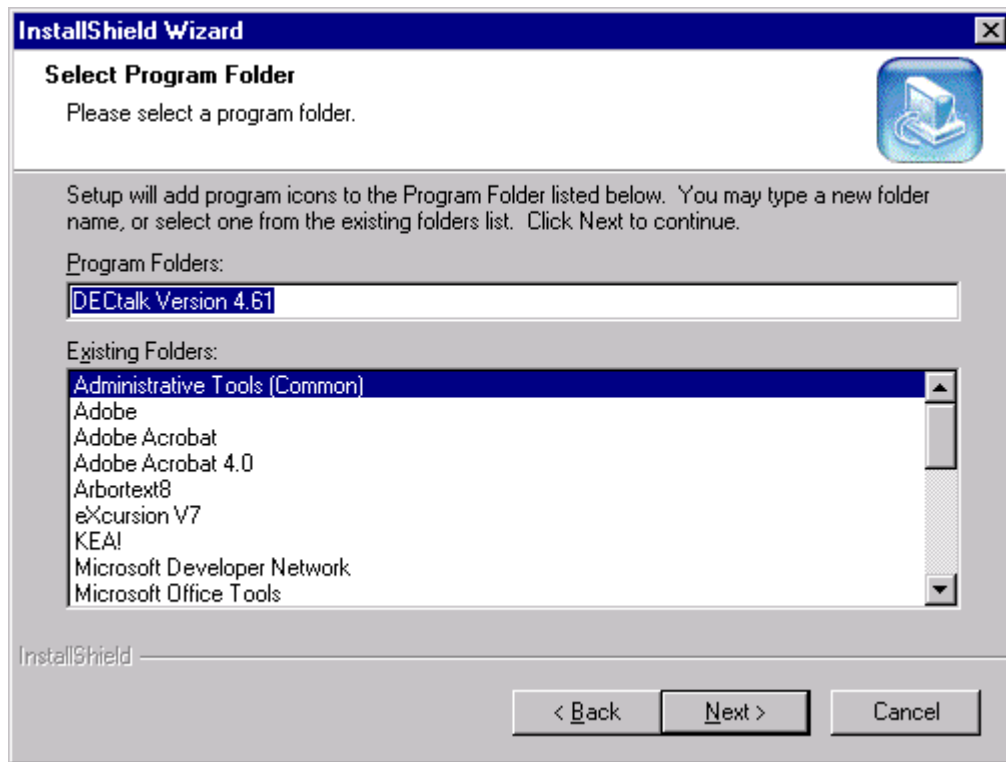
Next, the InstallShield Wizard displays the DECtalk Select Program Folder window, shown in *Figure 1-7*.

Select a Program Folder name to be included in the Windows Start menu Programs folder. You then will be able to access DECtalk components from the Start menu by clicking on the specified Program Folder name.

For example, if you accept the default name, DECtalk Version 4.61, you will be able to access a DECtalk component such as online help by navigating as follows: Start > Programs > DECtalk Version 4.61 > DECtalk Help.

To proceed with the DECtalk Software for Windows installation, click the **Next** button.

Figure 1-7 DECtalk Select Program Folder Window (95/98/ME/NT/2000)



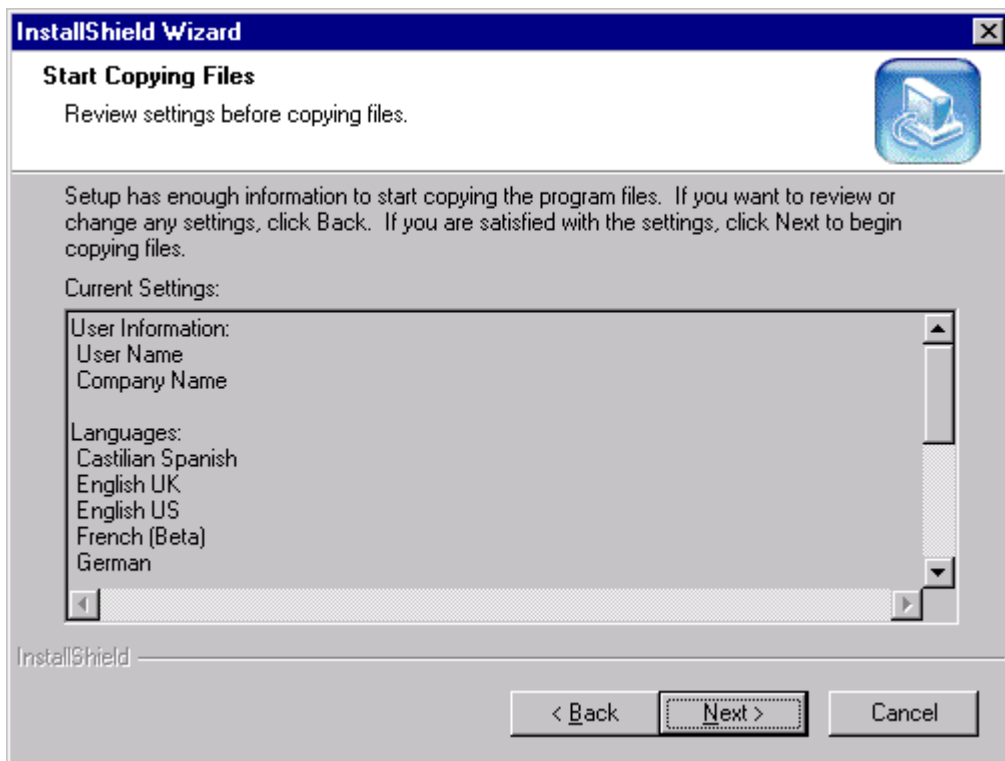
Starting the File Transfers

Next, the InstallShield Wizard displays the DECtalk Start Copying Files window, shown in *Figure 1-8*. This provides you a final opportunity to change any installation settings or halt the installation before any files are actually copied to your system.

To proceed with the DECtalk Software for Windows installation, click the **Next** button. To change installation settings, click the **Back** button. To halt the installation, click the **Cancel** button.

If you click **Next**, the InstallShield Wizard immediately performs the requested installation, while displaying a Setup Status window. This window is continually updated to display the current transfer in progress and the approximate percentage of the overall installation that has been completed.

Figure 1-8 DECtalk Start Copying Files Window (95/98/ME/NT/2000)



Selecting the Default Language

If you selected more than one language for your DECTalk Software installation, the InstallShield Wizard displays the DECTalk Setup for Default Language window, shown in *Figure 1-9*.

Select a default language among the languages listed for your installation.

To proceed with the DECTalk Software for Windows installation, click the **Next** button.

You can modify the default language selection after installation by reinvoking the Installation Wizard, as described in *Modifying the Current Installation*.

Figure 1-9 DECTalk Setup for Default Language Window (95/98/ME/NT/2000)



Completing the Installation

When the file transfers and (if applicable) the default language setup are complete, the InstallShield Wizard:

- Displays the DECTalk InstallShield Wizard Complete window, shown in *Figure 1-10*.

Click **Finish** to exit the InstallShield Wizard.

- Launches the **speak** program with `readme.txt` as input.

Note

When the installation is complete, run the program `licenin3.exe`, which increments the DECTalk license/key count from 1 to 4. If you included **License Key** in your installation, `licenin3` is installed in your selected installation directory (for example, `C:\Program Files\DECTalk`). Otherwise, it can be run from the `license` subdirectory of your installation CD-ROM. The `licenin3` program increments the license/key count without displaying any messages.

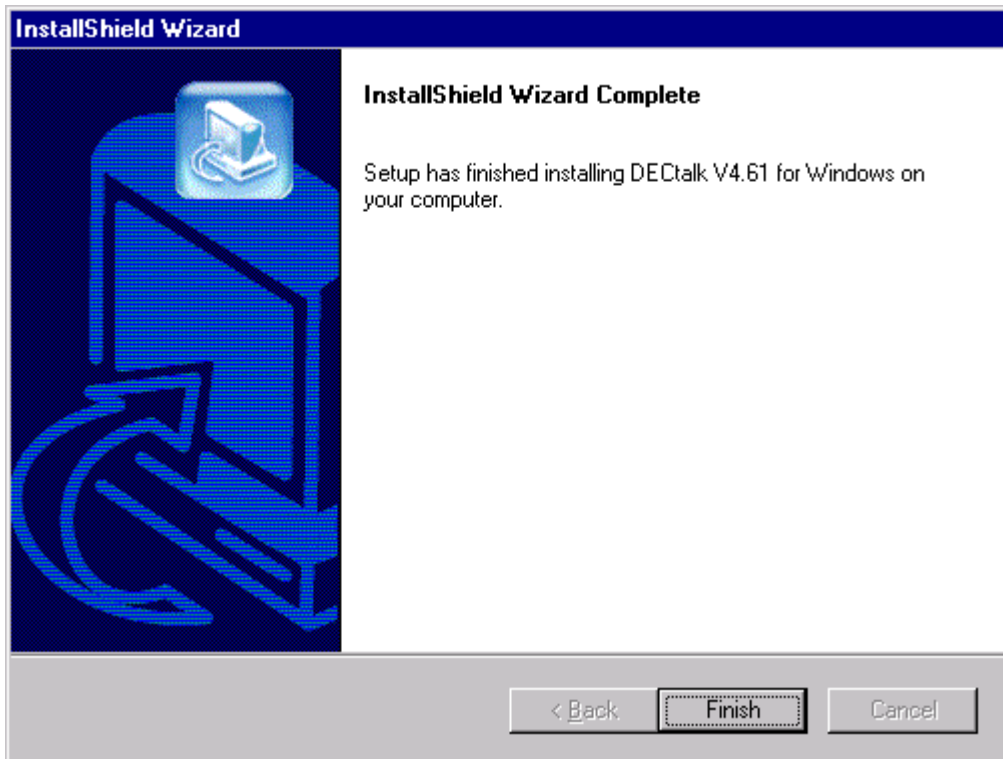
After the installation is complete:

- For a listing of files contained in the source media, refer to file `appendix1.txt`.

NOTE: All `appendix` and other `readme` text files can be accessed either from the Programs menu (for example, Start > Programs > DECTalk V4.61 > Appendix1) or at the top level of the installation Destination Directory (for example, `c:\Program Files\DECTalk\appendix1.txt`).

- For development hints, refer to file `appendix2.txt`.
- For a list of Microsoft Speech API functions supported by DECTalk Software, refer to file `appendix3.txt`.
- For additional information, consult the DECTalk Software documentation. See *Displaying Documentation*, which describes the various forms and locations in which documentation is provided.

Figure 1-10 DEctalk InstallShield Wizard Complete Window (95/98/ME/NT/2000)

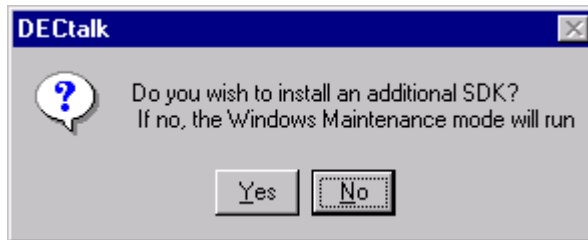


Modifying, Repairing, or Removing a DECTalk Windows SDK Installation

To modify, repair, or remove an existing DECTalk Windows SDK installation, you can:

- Launch the Windows control panel **Add/Remove Programs** and select **DECTalk V4.61 for Windows**
- Run the program `setup.exe` from the top level of your installation CD-ROM exactly as you did for the original installation

Either method reactivates the InstallShield Wizard for DECTalk Software. If you previously installed one or more DECTalk V4.61 SDKs, the following box is displayed:



Select **No** to proceed with modification, repair, or removal of a Windows SDK installation.

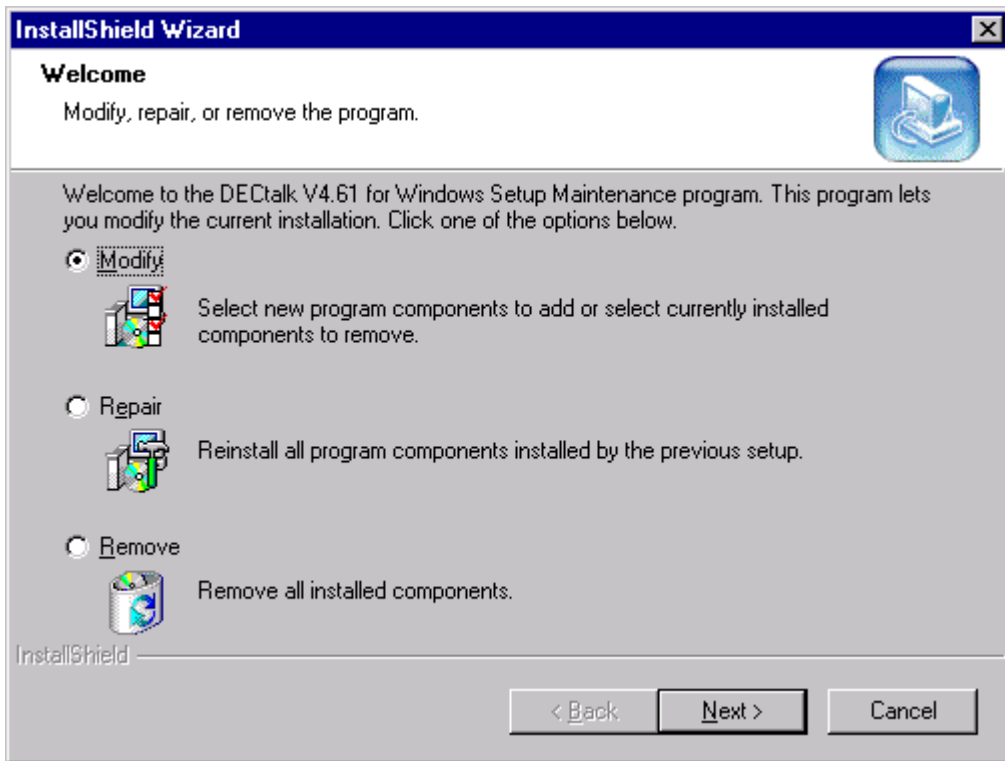
Next, the InstallShield Wizard displays the DECTalk Setup Maintenance window, displayed in *Figure 1-11*.

Select the action you want to perform:

- **Modify** the current installation, adding or removing components or resetting the default language
- **Repair** the current installation by exactly repeating the original installation
- **Remove** the current installation from the system

To proceed with the action you selected, click the **Next** button.

Figure 1-11 DECtalk Setup Maintenance Welcome Window (95/98/ME/NT/2000)



Modifying the Current Installation

If you specified that you wanted to **Modify** the current DECtalk Windows SDK installation, the InstallShield Wizard returns you to the point in the installation procedure where you can customize the installation components and settings. See *Selecting Components for a Custom Installation*.

Select your modifications and, when you are ready to proceed with modifying your DECtalk SDK installation, click the **Next** button.

Repairing the Current Installation

If you specified that you wanted to **Repair** the current DECtalk Windows SDK installation, the InstallShield Wizard repeats the previously configured installation, while displaying a Setup Status window. This window is continually updated to display the current transfer in progress and the approximate percentage of the overall installation that has been completed.

Removing the Current Installation

If you specified that you wanted to **Remove** the current DECtalk Windows SDK installation, the InstallShield Wizard displays a dialog box that asks you to confirm that you want to completely remove the application and all of its components from the system.

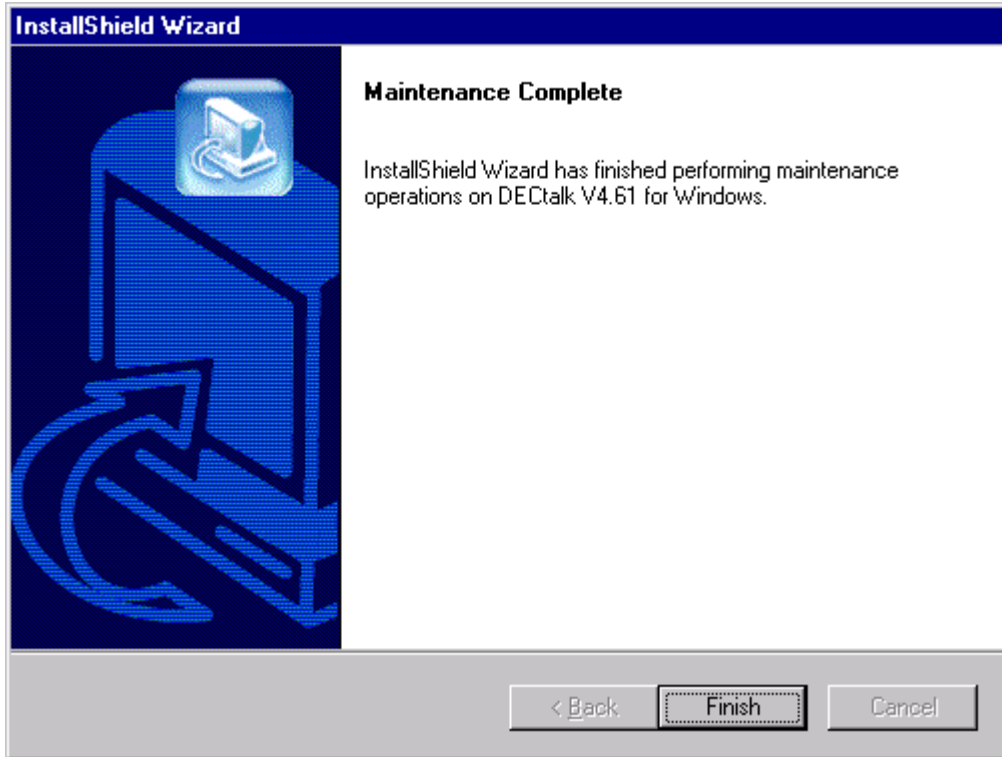
Select **OK** to completely deinstall the selected DECtalk SDK from your system. Select **Cancel** to exit the removal procedure.

Completing the Installation Maintenance

When the DECtalk Windows SDK installation modification you requested is complete, the InstallShield Wizard displays a Completion window, shown in *Figure 1-12*.

Click **Finish** to exit the InstallShield Wizard.

Figure 1-12 DECtalk Setup Maintenance Complete Window (95/98/ME/NT/2000)



Installing SAPI Version 5 Support (Optional)

DECTalk Software supports Version 5 of the Microsoft Speech API (SAPI) on Windows 98, Windows ME, Windows NT, and Windows 2000 platforms. For a list of supported functions, see the *Supported SAPI Version 5 Features* table in the *Reference Guide* manual and online help.

If you have installed the current version of DECTalk Software on a Windows 98, ME, NT, or 2000 system, you optionally can add SAPI Version 5 support to your DECTalk installation.

Note

In order to program SAPI Version 5 functions in your Windows speech applications, you must have Microsoft's system development kit (SDK) for SAPI Version 5, available from Microsoft. See the Microsoft web site for more information.

You can install SAPI Version 5 support by initiating a normal DECTalk Software installation from your installation CD-ROM and selecting to install the SAPI Version 5 SDK.

Starting the Installation

To start a DECTalk Software installation, insert the installation CD-ROM and wait for the InstallShield Wizard for DECTalk Software to appear.

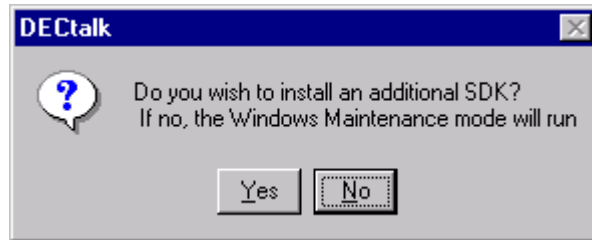
If the InstallShield Wizard does not appear automatically, run the program `setup.exe` from the top level of the installation CD-ROM. You can do this in one of the following ways:

- In the Windows Explorer, select the appropriate drive and click program `setup.exe`.
- In the Windows Run or Command Prompt dialog box, run `setup.exe` with a command such as:

```
f:\setup.exe
```

where `f` is replaced by the correct letter for your CD-ROM drive.

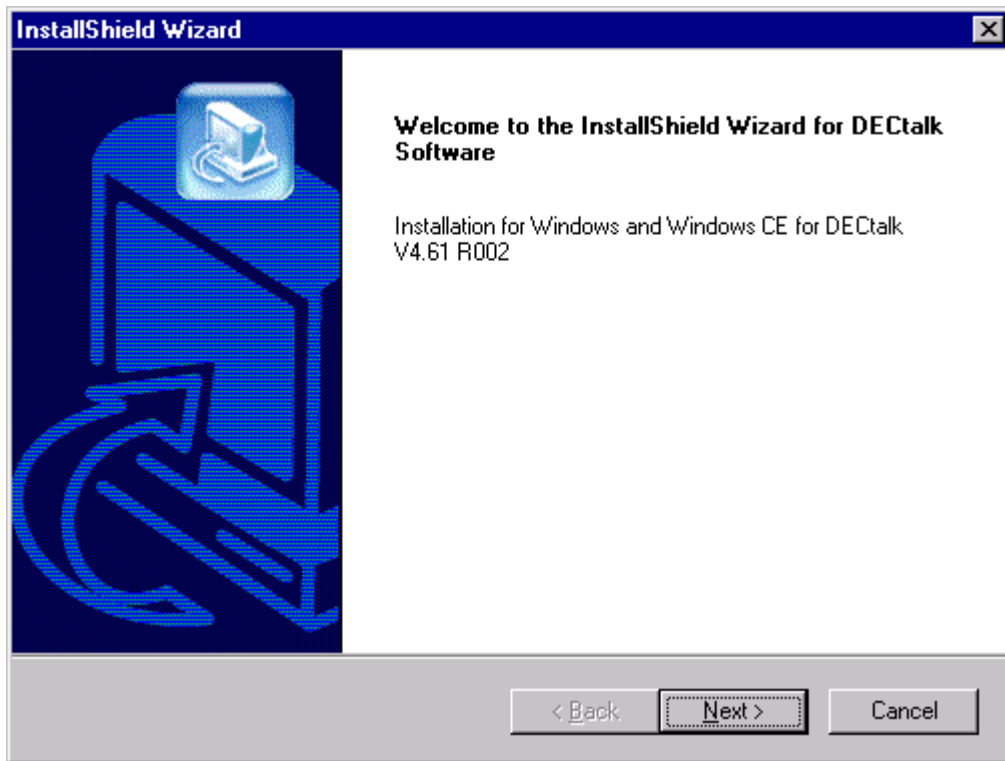
If you previously installed one or more DECTalk V4.61 SDKs, the following box is displayed:



To proceed with the DECTalk Software installation, click the **Yes** button.

If you have not yet run a DECTalk V4.61 installation, the InstallShield Wizard for DECTalk Software displays the DECTalk InstallShield Wizard Welcome window, shown in *Figure 1-13*. To proceed with the DECTalk Software installation, click the **Next** button.

Figure 1-13 DEctalk InstallShield Wizard Welcome Window



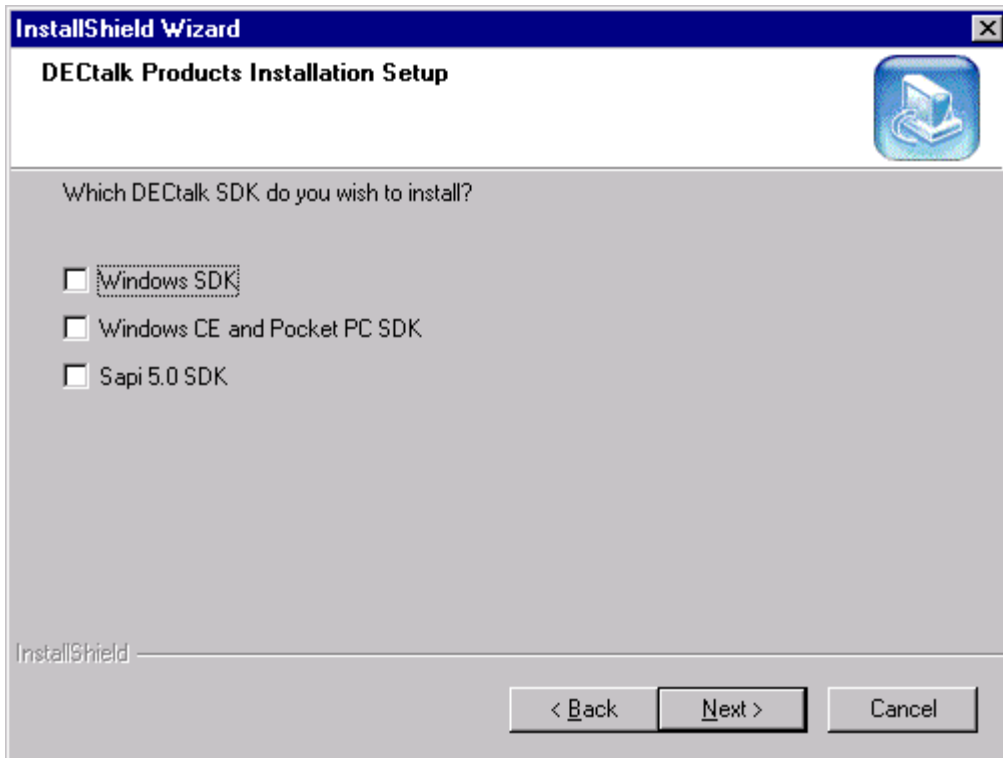
Selecting Which Kit to Install

Next, the InstallShield Wizard displays the DECTalk Products Installation Setup window, shown in *Figure 1-14*.

Select **Sapi 5.0 SDK** to install the SAPI Version 5 Software Development Kit (SDK) for Windows 98, ME, NT, or 2000.

To proceed with the DECTalk Software installation, click the **Next** button.

Figure 1-14 DECTalk Products Installation Setup Window

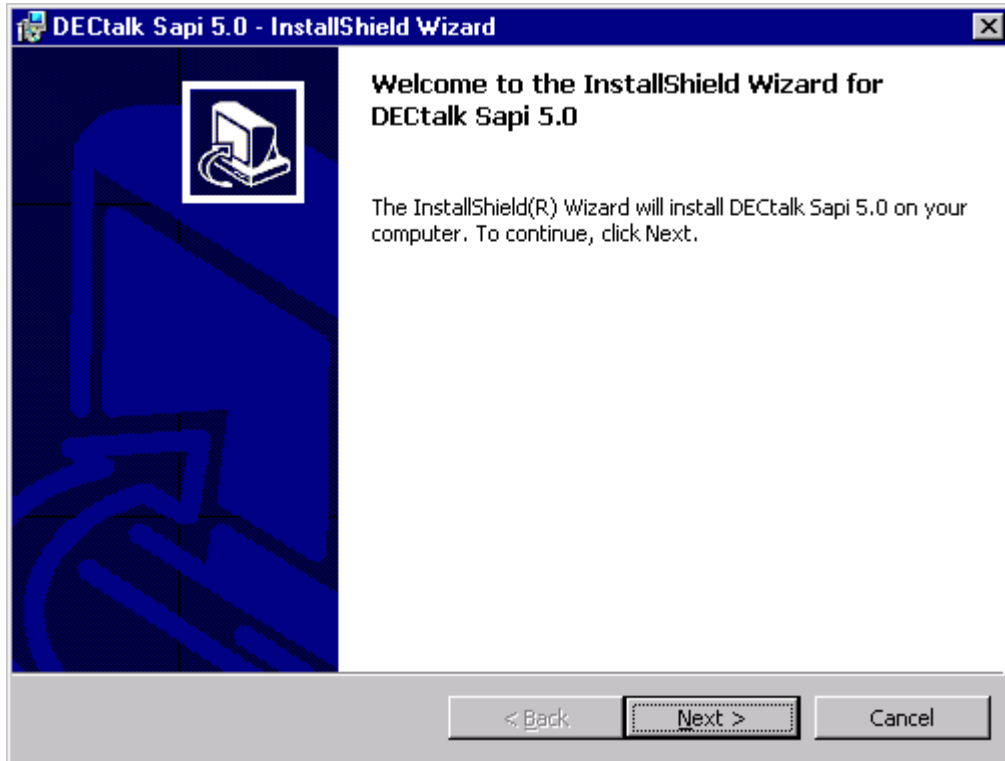


Starting the DECTalk SAPI Version 5 Installation

If you selected to install **Sapi 5.0 SDK**, the InstallShield Wizard displays a welcome window to indicate that DECTalk SAPI Version 5 SDK installation has begun, as shown in *Figure 1-15*.

To proceed with the DECTalk SAPI Version 5 installation, click the **Next** button.

Figure 1-15 DECTalk InstallShield Wizard Welcome Window (SAPI 5)



Reading the License Agreement

Next, the InstallShield Wizard displays a License Agreement window, which explains the terms of the DECTalk SAPI Version 5 license agreement. Please read the license agreement carefully and completely.

The License Agreement window allows you to accept or reject the terms of the license agreement. To install DECTalk SAPI Version 5 support, you must understand and choose to accept all the license agreement terms. To accept the license agreement, select **I accept the terms in the license agreement**. To proceed with the DECTalk SAPI Version 5 installation, click the **Next** button.

If you do not accept the license agreement, select **I do not accept the terms in the license agreement**, which will terminate the installation.

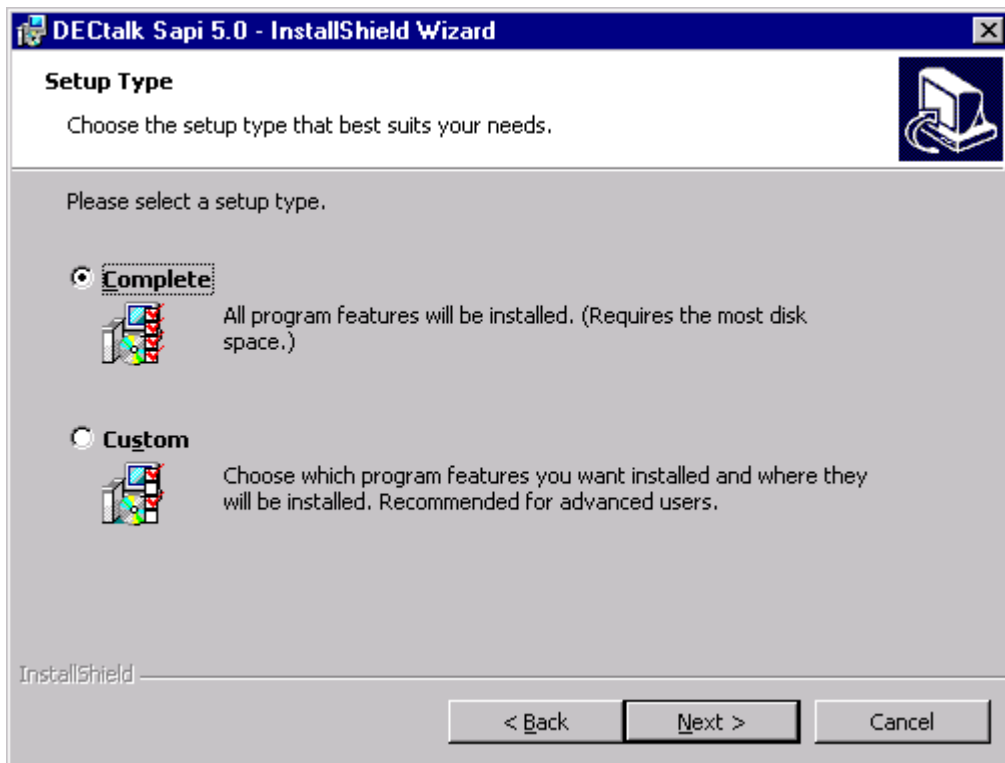
Selecting a Complete or Custom Installation

Next, the InstallShield Wizard displays the DECTalk Setup Type window, shown in *Figure 1-18*.

Select either a **Complete** installation, the default, which will install all program features to a Sapi5 folder in your existing DECTalk installation directory; or a **Custom** installation, which allows you to customize the location and other details of the installation.

To proceed with the DECTalk SAPI Version 5 installation, click the **Next** button.

Figure 1-16 DECTalk Setup Type Window (SAPI 5)



Customizing the Installation

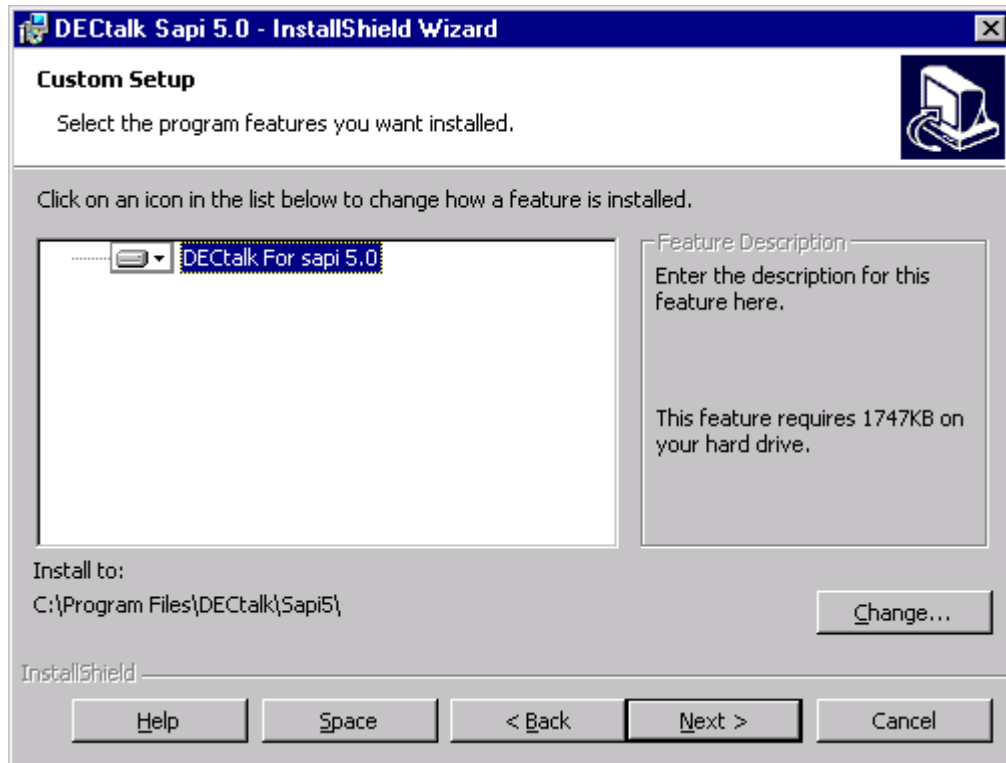
If you selected a **Custom** installation, the InstallShield Wizard displays the DECTalk Custom Setup window, shown in *Figure 1-19*.

By clicking on the **DECTalk for SAPI 5.0** icon in the feature list, you can alter the installation so that the SAPI Version 5 support will be installed only when required.

By clicking on the **Change** button, you can redirect the installation to a target directory other than a Sapi5 subdirectory of your existing DECTalk installation directory.

When you are ready to proceed with the DECTalk SAPI Version 5 installation, click the **Next** button.

Figure 1-17 DECTalk Custom Setup Window (SAPI 5)



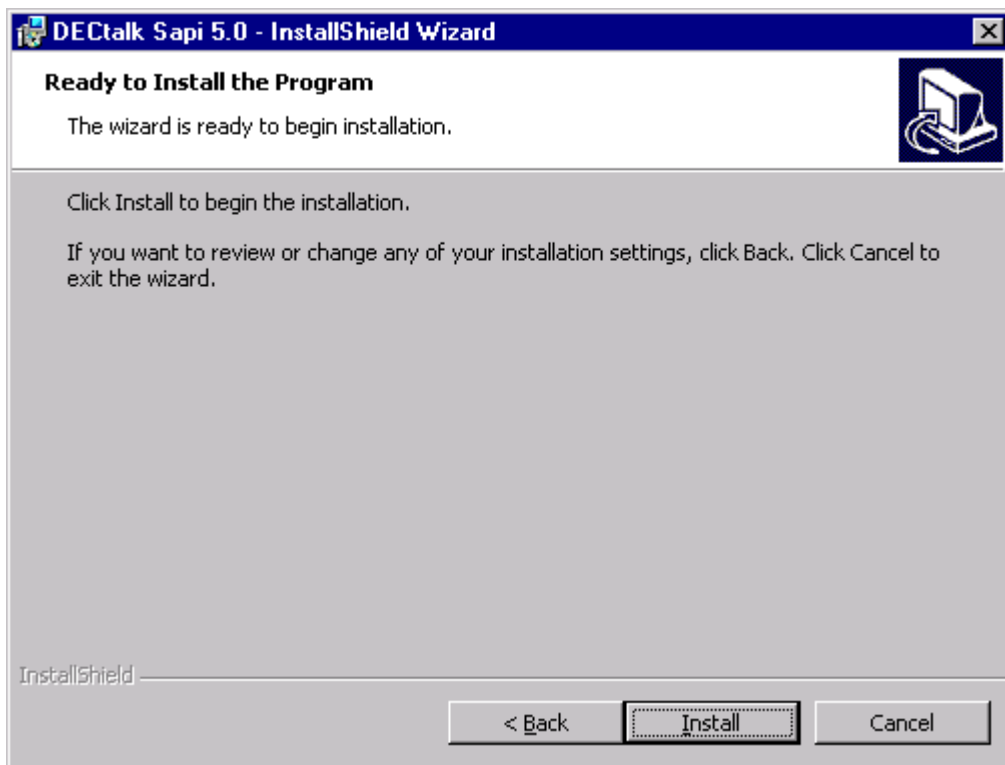
Starting the File Transfers

Next, the InstallShield Wizard displays the DECTalk Ready to Install the Program window, shown in *Figure 1-18*. This provides you a final opportunity to change any installation settings or halt the installation before any files are actually copied to your system.

To proceed with the DECTalk SAPI Version 5 installation, click the **Install** button. To change installation settings, click the **Back** button. To halt the installation, click the **Cancel** button.

If you click **Install**, the InstallShield Wizard immediately performs the requested installation, while displaying a Setup Status window. This window is continually updated to display the current transfer in progress and the approximate percentage of the overall installation that has been completed.

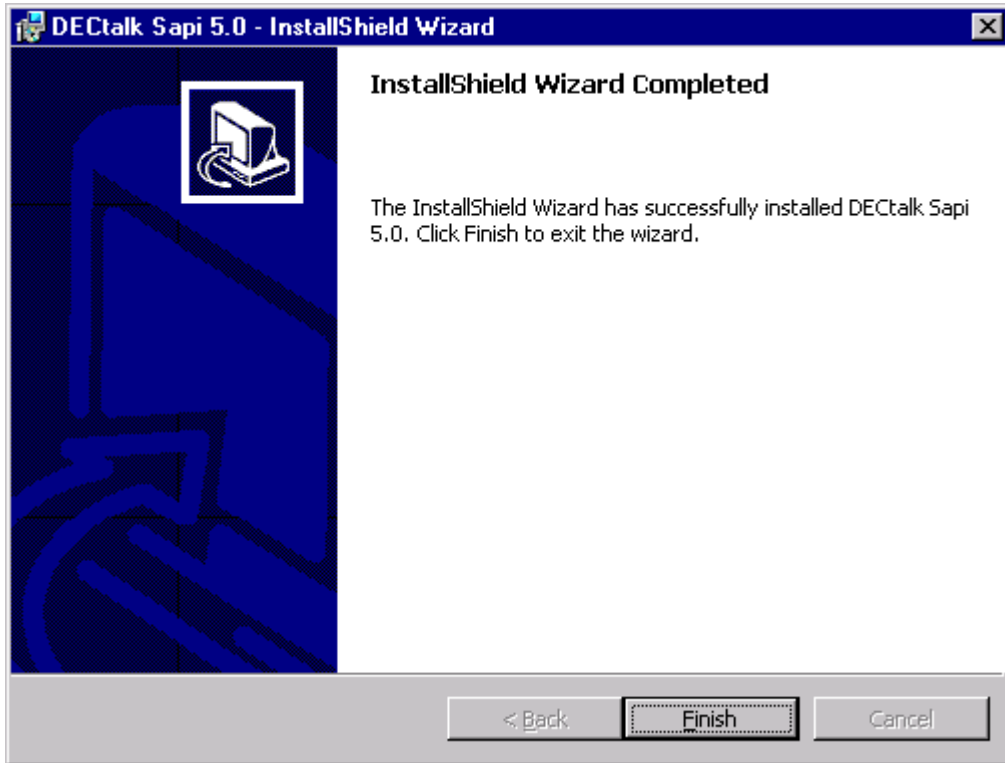
Figure 1-18 DECTalk Ready to Install the Program Window (SAPI 5)



Completing the Installation

When the SAPI Version 5 file transfers are complete, the InstallShield Wizard displays the DECTalk InstallShield Wizard Completed window, shown in *Figure 1-19*. Click **Finish** to exit the InstallShield Wizard.

Figure 1-19 DECTalk InstallShield Wizard Complete Window (SAPI 5)

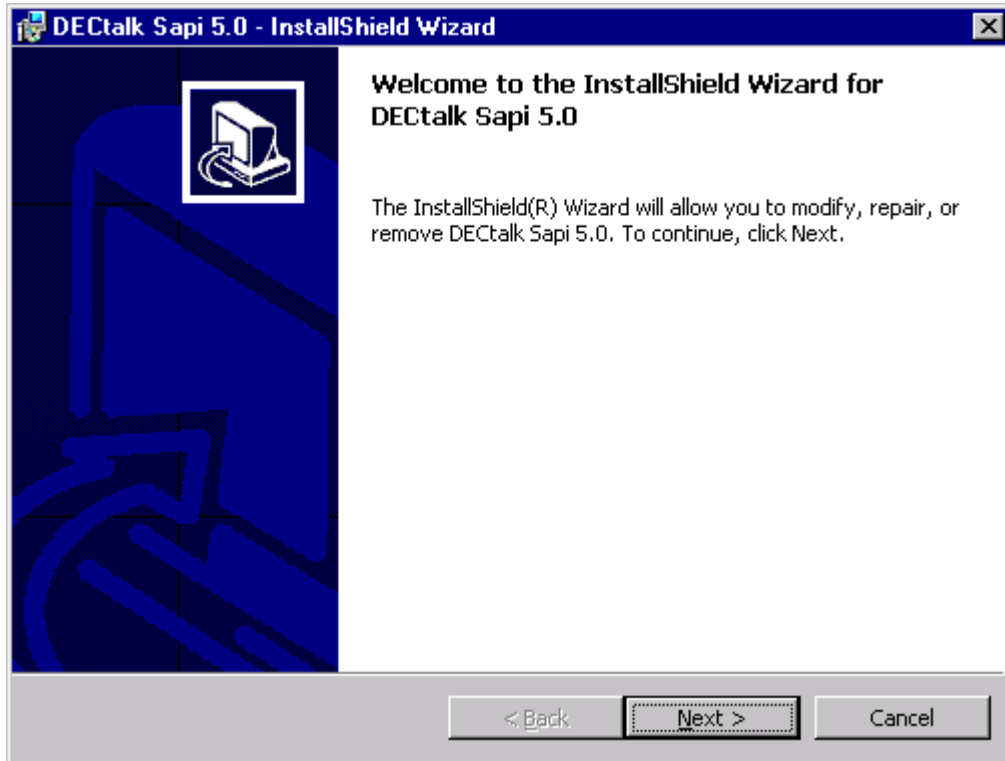


Modifying, Repairing, or Removing a DECTalk SAPI V5 SDK Installation

To modify, repair, or remove an existing DECTalk SAPI Version 5 SDK installation, you launch the Windows control panel **Add/Remove Programs** and select **DECTalk SAPI 5.0**. This reactivates the InstallShield Wizard, which displays a welcome window, shown in *Figure 1-20*.

To proceed with modifying, repairing, or removing your DECTalk SAPI Version 5 SDK installation, click the **Next** button.

Figure 1-20 DECTalk Program Maintenance Welcome Window (SAPI 5)



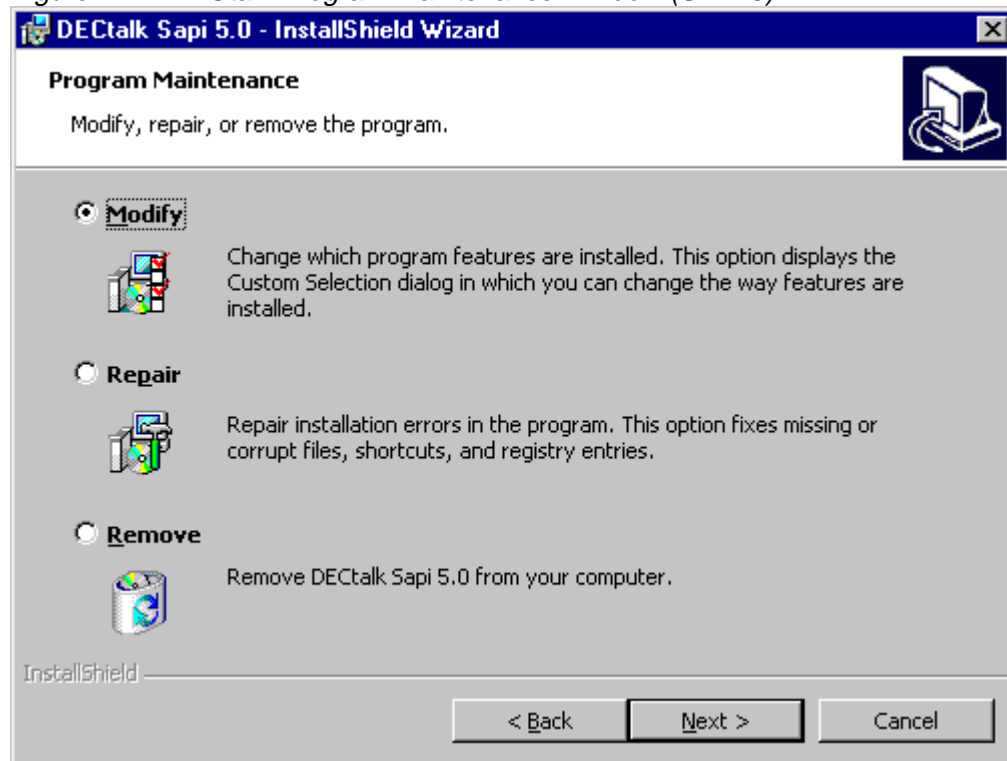
Next, the InstallShield Wizard displays the DECTalk Program Maintenance window, displayed in *Figure 1-21*.

Select the action you want to perform:

- **Modify** the current installation, changing the way features are installed
- **Repair** the current installation by exactly repeating the original installation
- **Remove** the current installation from the system

To proceed with the action you selected, click the **Next** button.

Figure 1-21 DECTalk Program Maintenance Window (SAPI 5)



Modifying the Current Installation

If you specified that you wanted to **Modify** the current DECTalk SAPI Version 5 SDK installation, the InstallShield Wizard returns you to the point in the installation procedure where you can customize the installation components and settings. See *Customizing the Installation*.

Select your modifications and, when you are ready to proceed with modifying your DECTalk SDK installation, click the **Next** button.

Repairing the Current Installation

If you specified that you wanted to **Repair** the current DECTalk SAPI Version 5 SDK installation, the InstallShield Wizard repeats the previously configured installation, while displaying a Setup Status window. This window is continually updated to display the current transfer in progress and the approximate percentage of the overall installation that has been completed.

Removing the Current Installation

If you specified that you wanted to **Remove** the current DECTalk SAPI Version 5 SDK installation, the InstallShield Wizard displays a dialog box that asks you to confirm that you want to completely remove the application and all of its components from the system.

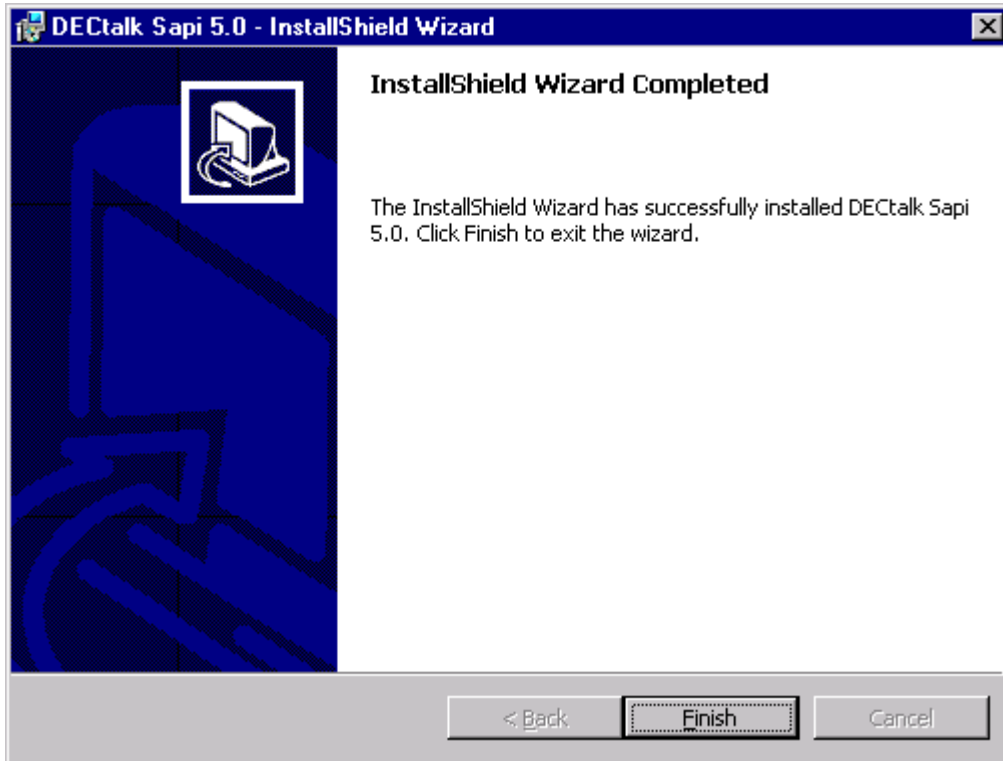
Select **Remove** to completely deinstall the DECTalk SAPI Version 5 SDK from your system. Select **Cancel** to exit the removal procedure.

Completing the Installation Maintenance

When the SDK installation modification you requested is complete, the InstallShield Wizard displays a Completion window, such as shown in *Figure 1-22*.

Click **Finish** to exit the InstallShield Wizard.

Figure 1-22 DECTalk Program Maintenance Complete Window (SAPI 5)



Displaying Documentation

The DECtalk Software documentation is provided in PDF and other formats on the distribution CD-ROM. You can display the PDF files on your workstation using Adobe Acrobat Reader.

After a successful installation, DECtalk Software online help is accessible in the form of Windows Help. DECtalk Software Windows Help is part of the application and is easily accessed from any of the applets or from the Help icon in the DECtalk program group.

You can find specific information in Help by using keyword searches and the index. Windows Help has a powerful cross-referencing facility that allows you to access many related topics in the same session.

The DECtalk Software Windows Help file includes guide and reference information about the following DECtalk features:

- **DECtalk Software applets**
 - Select DECtalk Software and then the DECtalk Applet Master Index.
- **DECtalk Software API functions**
 - Select the Programmer's Guide and then the Introduction to the DECtalk Software API.
 - Select the Reference Guide and then DECtalk Software API Functions.
- **DECtalk Software in-line commands**

Select the Reference Guide and then one of the following:

 - DECtalk Software In-Line Commands.
 - Using In-Line Commands.

Solving Installation Problems

If errors occur during the installation procedure, DECTalk Software returns an error message. Installation errors usually occur if any of the following conditions exist:

- The operating system version is incorrect.
- The prerequisite software and hardware components or version is missing or incorrect.
- Insufficient disk space is available.
- System files and parameters are not updated to reflect exact file locations and directory naming conventions.

If you have problems while using DECTalk Software and you believe the error is caused by the application, do one of the following:

- If you purchased DECTalk Software from an Authorized Distributor or Reseller, contact your Authorized Distributor or Reseller for support.
- If you purchased or licensed DECTalk Software *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

For up-to-date information about support options, visit the Force DECTalk web site at: <http://www.forcecomputers.com/product/dectalk/dtalk.htm>.

Chapter 2 — Installing DECTalk Software for Windows CE

This chapter provides information you need to install the DECTalk Software Development Kit (SDK) for Windows CE on a Windows 95, 98, ME, NT, or 2000 host system running on an Intel processor.

The Windows 95/98/ME/NT/2000 host system must host a Personal Digital Assistant (PDA) with audio capability that is running Windows CE in one of the following configurations:

Windows CE Version	Hardware Architecture
2.00 for MS HPC	<ul style="list-style-type: none">• MIPS• SH3• X86EM
2.11 for MS HPC Pro	<ul style="list-style-type: none">• MIPS• SH3• SH4• StrongARM• X86EM
2.11 for Palm-Size PC	<ul style="list-style-type: none">• MIPS• SH3• X86EM
3.00 for Pocket PC	<ul style="list-style-type: none">• MIPS• SH3• StrongARM• X86EM

Specific topics in this chapter include:

- Preparing for installation
- Installing DECTalk Software
- Modifying, repairing, or removing the current installation
- Displaying documentation
- Solving installation problems

The DECTalk Software documentation is provided in PDF and other formats on the distribution CD-ROM. After a successful installation, DECTalk Software online help is accessible on the host system in the form of Windows Help. For more information, see *Displaying Documentation*.

Notes

- The following formats are not supported in any **TextToSpeech...()** function call because of a limitation in the Windows CE operating system:
WAVE_FORMAT_1M16 and WAVE_FORMAT_08M08.
- The Windows CE SDK does not support Microsoft Speech API (SAPI) functions.

Preparing for Installation

DECtalk Software is installed from the installation media shipped with the product. The installation should take you no longer than ten minutes to complete. You can launch the InstallShield Wizard for DECTalk Software automatically, by inserting the installation CD-ROM, or manually, by using Windows Explorer or the Windows Run or Command Prompt facilities on your host system.

Before installing DECTalk Software:

- Make sure that all prerequisite hardware and software components are installed on your system.
- If another version of DECTalk Software is already installed, close any running DECTalk applications and uninstall the existing DECTalk Software.

During DECTalk Software installation, the InstallShield Wizard will display a License Agreement window, which explains the terms of the DECTalk Software license agreement, and a Readme window, which provides the latest information about the DECTalk Software product. **Please read the complete contents of both windows carefully and make sure that you understand them before you continue.**

Hardware Requirements

DECTalk Software for Windows CE requires an Intel-based Windows host system with adequate disk space for installation.

DECTalk Software performance is dependent on your system having enough computational power to perform all the computations involved in text-to-speech conversion. See the release notes for a list of the latest supported systems.

Note

DECTalk Software performance can be affected in a heavily loaded multitasking environment where DECTalk Software could become starved for computational power and will not speak continuously. There might be pauses in output for any application running on such a system.

Audio Output Device

Your system must be configured with an audio device and appropriate driver that support 8-bit or 16-bit data format at an 11.025 kHz sample rate. You can install DECTalk Software without an audio device present and capture .wav audio files; however, an audio device must be present to actually have DECTalk Software speak text.

Required Disk Space and Software

DECTalk Software for Windows CE requires:

- Windows 95, 98, ME, NT, or 2000 running on the Intel-based host system
- A minimum of 75 MB of disk space on the host for a Full Installation; however, if you specify a Custom Installation to the InstallShield Wizard, you can monitor the disk space required and make adjustments (see *Selecting Components for a Custom Installation*)
- Windows CE running on the PDA; consult the CE kit's README.TXT file or the beginning of this chapter for supported CE/hardware combinations

Installing DECTalk Software

You can start the DECTalk Software installation automatically, by inserting the installation CD-ROM, or manually, from the Windows Explorer or from the Windows Run or Command Prompt dialog boxes on your host system. Starting the installation activates the InstallShield Wizard for DECTalk Software, which will guide you through the necessary steps and decisions.

If a previous version of DECTalk Software exists on your system, the new installation overwrites it.

Note

Before installing this version of DECTalk Software, close any running DECTalk applications and uninstall any existing DECTalk Software.

This Software Development Kit (SDK) is provided on a single CD-ROM that lets you install any or all of the supported languages, including United States English, United Kingdom English, Castilian Spanish, Latin American Spanish, German, and French.

Starting the Installation

To start the DECTalk Software installation, insert the installation CD-ROM and wait for the InstallShield Wizard for DECTalk Software to appear.

If the InstallShield Wizard does not appear automatically, run the program `setup.exe` from the top level of the installation CD-ROM. You can do this in one of the following ways:

- In the Windows Explorer, select the appropriate drive and click program `setup.exe`.
- In the Windows Run or Command Prompt dialog box, run `setup.exe` with a command such as:

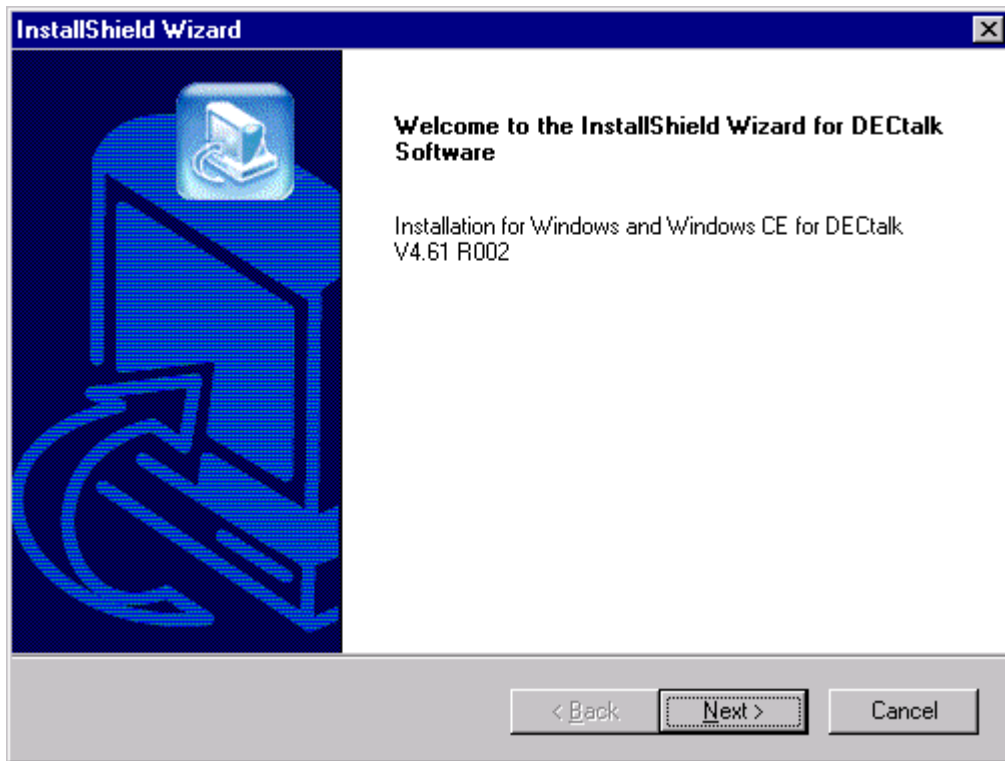
```
f:\setup.exe
```

where `f` is replaced by the correct letter for your CD-ROM drive.

When activated, the InstallShield Wizard for DECTalk Software displays the DECTalk InstallShield Wizard Welcome window, shown in *Figure 2-1*.

To proceed with the DECTalk Software installation, click the **Next** button.

Figure 2-1 DECTalk InstallShield Wizard Welcome Window



Selecting Which Kit to Install

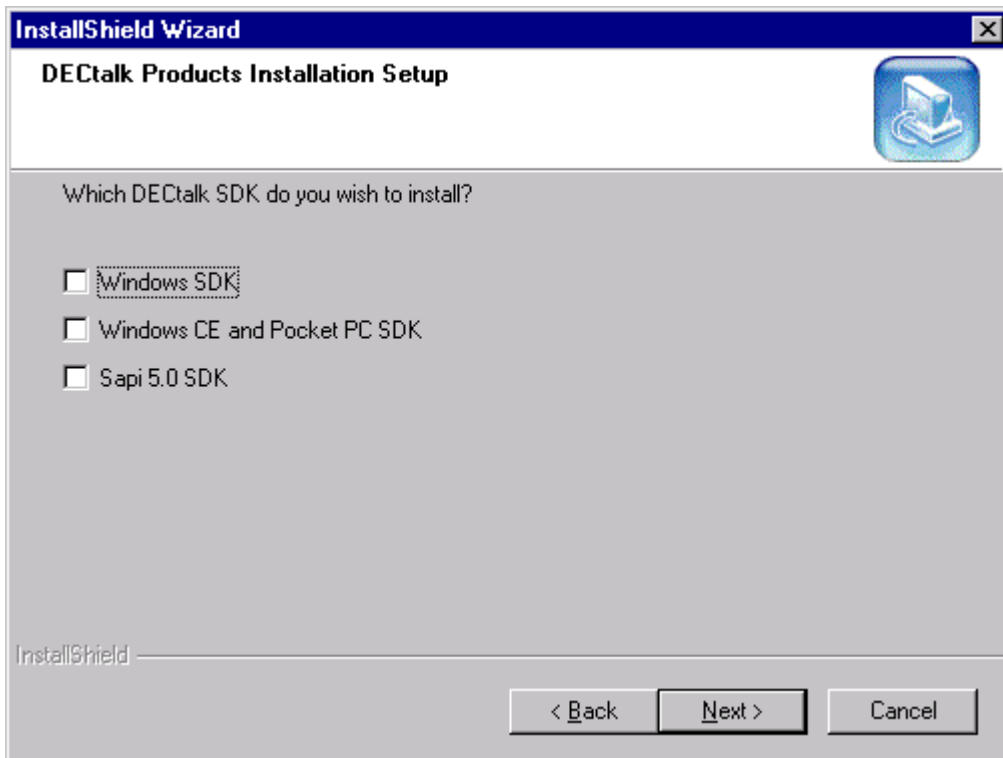
Next, the InstallShield Wizard displays the DECTalk Products Installation Setup window, shown in *Figure 2-2*.

Select **Windows CE and Pocket PC SDK** to install the DECTalk Software Development Kit (SDK) for Windows CE or Windows Pocket PC.

You can additionally select **Windows SDK**, **Sapi 5.0 SDK**, or both. For details about those installation procedures, see the chapter *Installing DECTalk Software for Windows 9x/ME/NT/2000*.

To proceed with the DECTalk Software installation, click the **Next** button.

Figure 2-2 DECTalk Products Installation Setup Window



Reading the License Agreement

Next, the InstallShield Wizard displays a License Agreement window, which explains the terms of the DECtalk Software license agreement. Please read the license agreement carefully and completely.

The License Agreement window asks if you accept all the terms of the license agreement. To install DECtalk Software, you must understand and choose to accept the license agreement terms. To accept the license agreement, click the **Yes** button.

If you do not accept the license agreement, click **No**, which will terminate the installation.

Reading the Release Notes

Next, the InstallShield Wizard displays a Readme window, containing release notes that detail the latest information about the DECtalk Software product. Please read the release notes carefully and completely.

To proceed with the DECtalk Software installation, click the **Next** button.

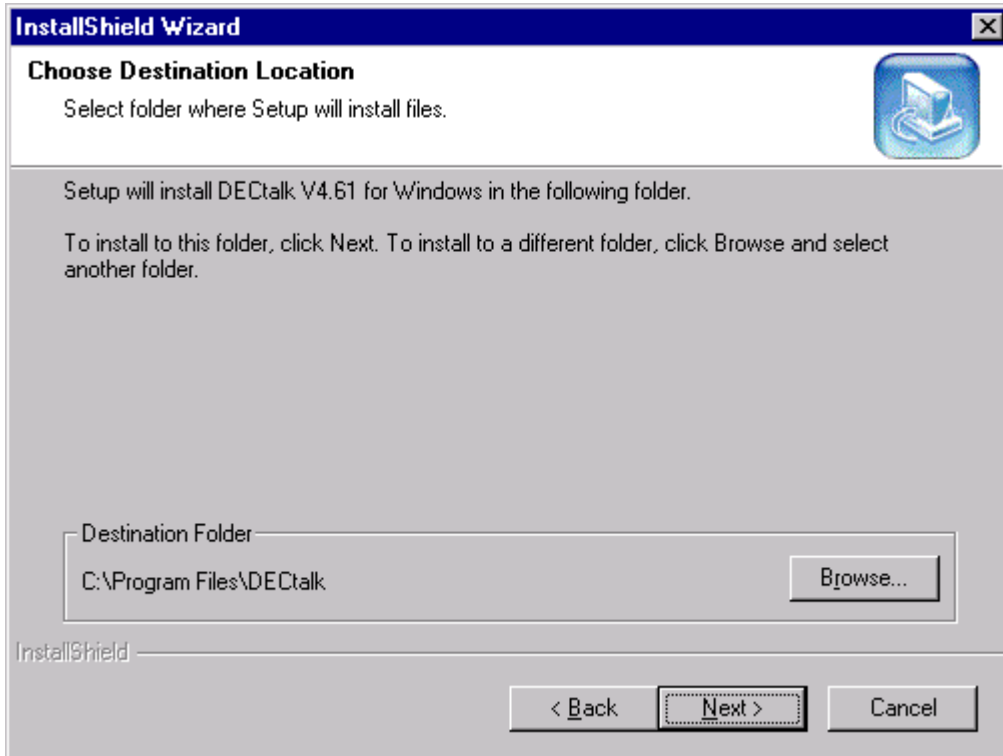
Choosing the Installation Destination Directory

Next, the InstallShield Wizard displays the DECtalk Choose Destination Location window, shown in *Figure 2-3*.

Select the directory to which you want to install DECtalk Software. You can accept the default installation directory, C:\Program Files\DECtalk, or click the **Browse** button and select another folder.

To proceed with the DECtalk Software installation, click the **Next** button.

Figure 2-3 DECtalk Choose Destination Location Window

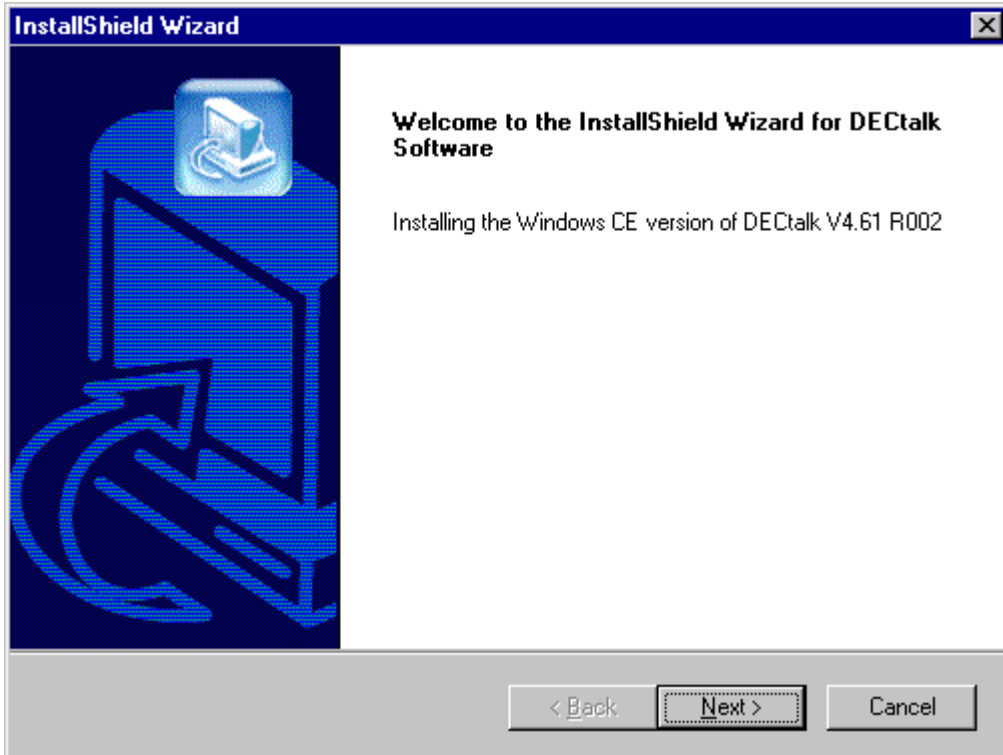


Starting the DECTalk Software for Windows CE Installation

If you selected to install **Windows CE and Pocket PC SDK** in the previous step, the InstallShield Wizard displays a welcome window to indicate that Windows CE and Pocket PC SDK installation has begun, as shown in *Figure 2-4*.

To proceed with the DECTalk Software for Windows CE installation, click the **Next** button.

Figure 2-4 DECTalk InstallShield Wizard Welcome Window (CE)



Entering Customer Information

Next, the InstallShield Wizard displays a Customer Information window. You can fill in the User Name and Company Name fields as appropriate

To proceed with the DECTalk Software installation, click the **Next** button.

Selecting Full, By-Platform, or Custom Installation

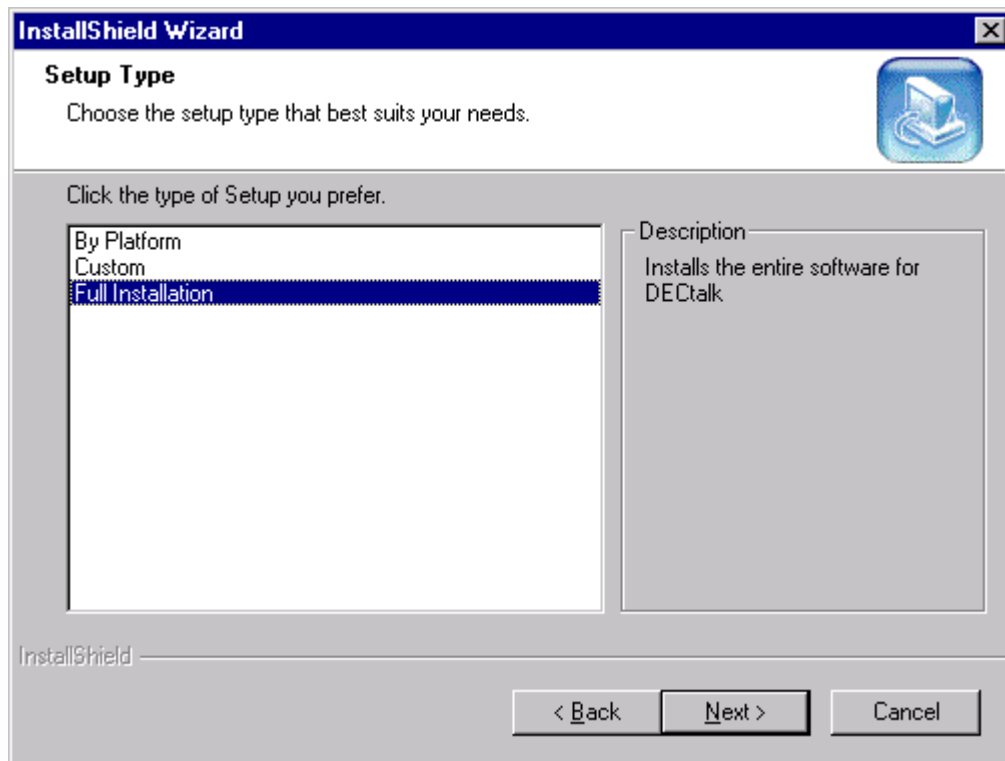
Next, the InstallShield Wizard displays the DECTalk Setup Type window, shown in *Figure 2-5*.

Select one of the following:

- **Full Installation**, the default, which will install all languages, all sample programs, help files, and documentation
- **By Platform** installation, if you wish to exactly specify which platforms to include and exclude
- **Custom** installation, if you wish to exactly specify which components to include and exclude

To proceed with the DECTalk Software for Windows CE installation, click the **Next** button.

Figure 2-5 DECTalk Setup Type Window (CE)



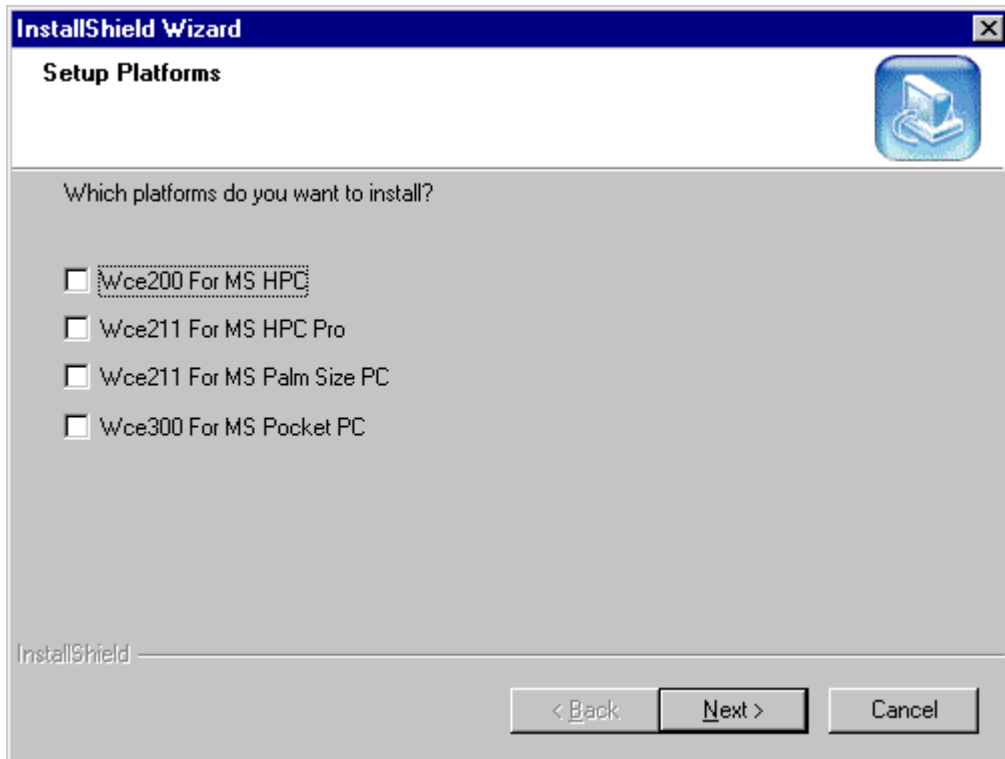
Selecting Platforms for By-Platform Installation

If you selected installation **By Platform**, the InstallShield Wizard displays the DECtalk Setup Platforms window, shown in *Figure 2-6*.

By checking and unchecking boxes, select the Windows CE version(s) for which to install DECtalk Software support. You can consult the CE kit's README file or the beginning of this chapter for a list of supported CE/hardware platform combinations.

When you are ready to proceed with the DECtalk Software for Windows CE installation, click the **Next** button.

Figure 2-6 DECtalk Setup Platforms Window (CE)



Selecting Components for a Custom Installation

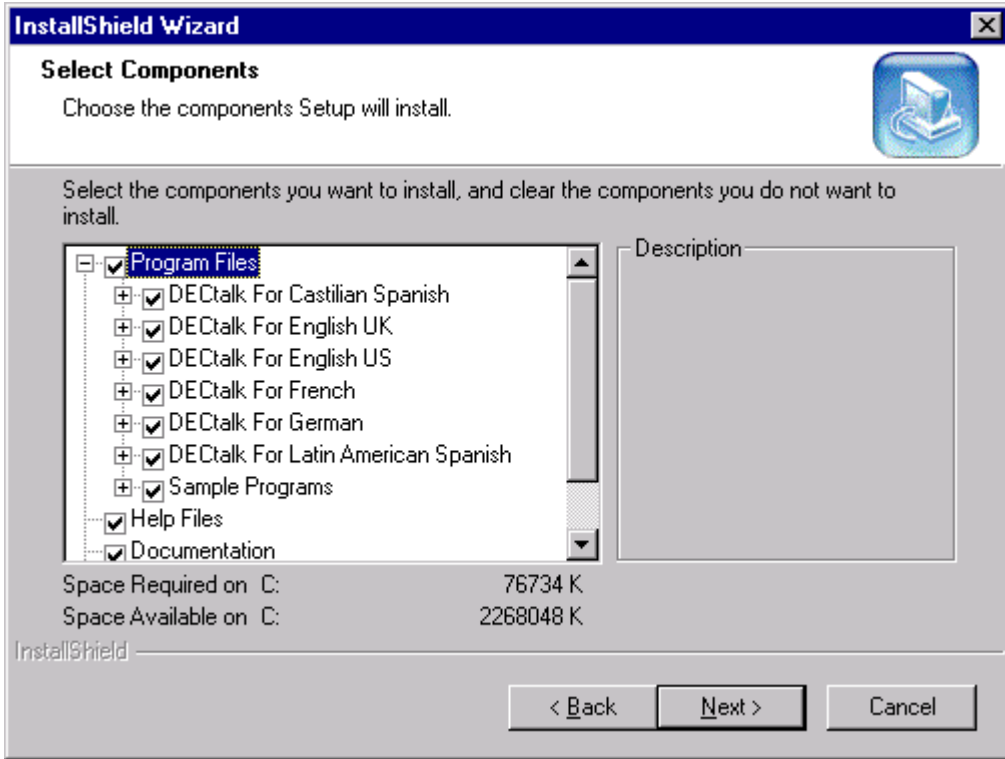
If you selected a **Custom** installation, the InstallShield Wizard displays the DECtalk Select Components window, shown in *Figure 2-7*.

By checking and unchecking boxes, select the DECtalk Software components to be included or excluded from your installation. As you include or exclude components in the window, the Space Required field is updated to reflect the memory requirements for your selected components.

The **License Key** box shown in *Figure 2-7* pertains to the `licenin3` program, which you run immediately after the installation to increment the DECtalk license/key count from 1 to 4. If you would like to be able to run `licenin3` from your installation directory rather than from the installation CD-ROM, the **License Key** box must be selected.

When you are ready to proceed with the DECtalk Software for Windows CE installation, click the **Next** button.

Figure 2-7 DECTalk Select Components Window (CE)



Naming the Program Folder

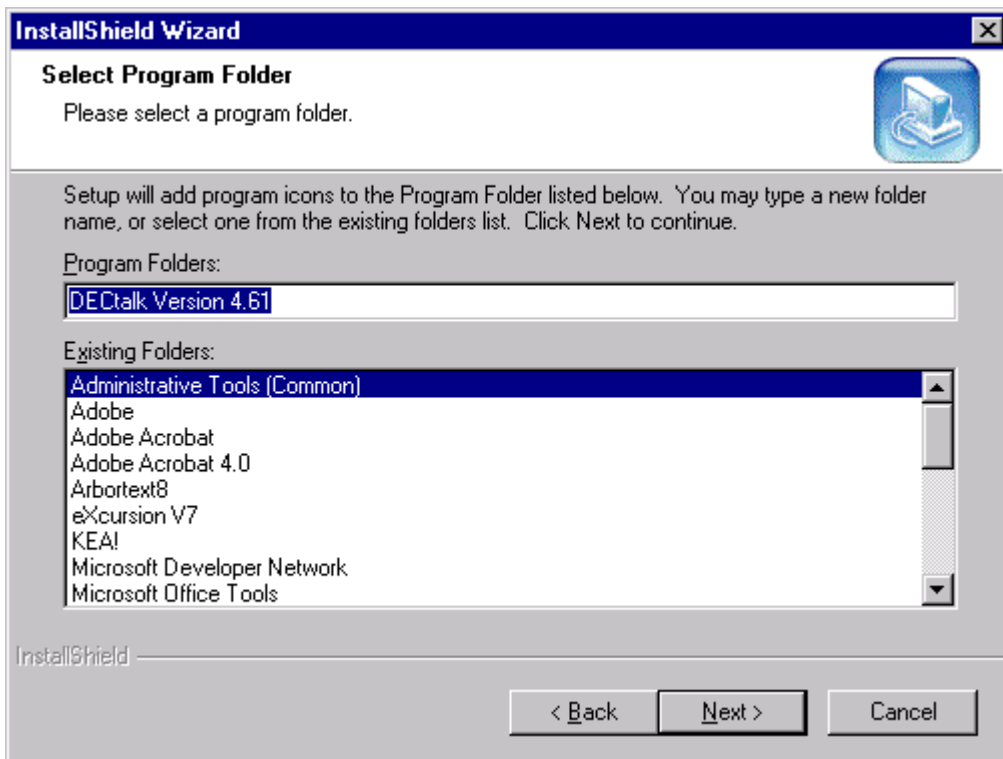
Next, the InstallShield Wizard displays the DECtalk Select Program Folder window, shown in *Figure 2-8*.

Select a Program Folder name to be included in the Windows Start menu Programs folder. You then will be able to access DECtalk components from the Start menu by clicking on the specified Program Folder name.

For example, if you accept the default name, DECtalk Version 4.61, you will be able to access a DECtalk component such as online help by navigating as follows: Start > Programs > DECtalk Version 4.61 > DECtalk Help.

To proceed with the DECtalk Software for Windows CE installation, click the **Next** button.

Figure 2-8 DECtalk Select Program Folder Window (CE)



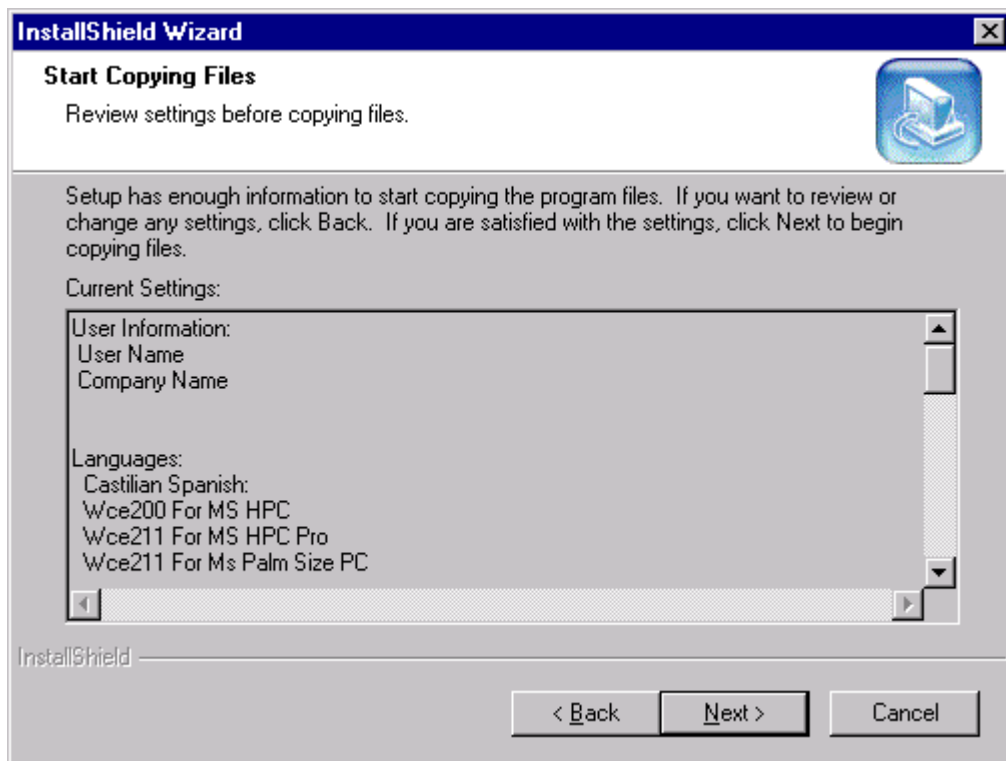
Starting the File Transfers

Next, the InstallShield Wizard displays the DECTalk Start Copying Files window, shown in *Figure 2-9*. This provides you a final opportunity to change any installation settings or halt the installation before any files are actually copied to your system.

To proceed with the DECTalk Software installation, click the **Next** button. To change installation settings, click the **Back** button. To halt the installation, click the **Cancel** button.

If you click **Next**, the InstallShield Wizard immediately performs the requested installation, while displaying a Setup Status window. This window is continually updated to display the current transfer in progress and the approximate percentage of the overall installation that has been completed.

Figure 2-9 DECTalk Start Copying Files Window (CE)



Completing the Installation

When the file transfers are complete, the InstallShield Wizard launches the User Dictionary Build Tool (**windic**) program, which you can use to create a loadable dictionary (.dic) file. For more information, you can access online help directly from **windic**.

Note

When the installation is complete, run the program `licenin3.exe`, which increments the DECTalk license/key count from 1 to 4. If you included **License Key** in your installation, `licenin3` is installed in your selected installation directory (for example, `C:\Program Files\DECTalk`). Otherwise, it can be run from the `license` subdirectory of your installation CD-ROM. The `licenin3` program increments the license/key count without displaying any messages.

After the installation is complete:

- For a listing of files contained in the source media, refer to file `appendix1.txt`.

NOTE: All `appendix` and other `readme` text files can be accessed either from the Programs menu (for example, `Start > Programs > DECTalk V4.61 > Appendix1`) or at the top level of the installation Destination Directory (for example, `c:\Program Files\DECTalk\appendix1.txt`).

- For development hints, refer to file `appendix2.txt`.
- For additional information, consult the DECTalk Software documentation. See *Displaying Documentation*, which describes the various forms and locations in which documentation is provided.

Configuring the Windows CE Target System

To configure DECTalk Software on the Windows CE target system:

1. Run Windows CE Agent to set up the Windows CE registry on the Windows CE target system.
2. Run Microsoft Active Sync to transfer files from the DECTalk installation directory on your Windows host to the Windows CE target system.
3. Copy the DLLs (`dectalk.dll`, `dtalk_xx.dll`) to the CE target's `\windows` directory.
4. Copy the dictionary files (`dtalk_xx.dic`) and the executable files (`*.exe`) to one of the following directories, according to the CE version and platform you are running:
 - For Windows CE 2.00 or 2.11 (MS HPC Pro), `\My Handheld PC`
 - For Windows CE 2.11 (palm size PC), `\My Palm Size PC`
 - For Windows 3.00 (pocket PC), `\My Device`

Should the DECTalk Software for Windows CE configuration become unstable at a later point, you can repair the current installation as described in *Repairing the Current Installation* and then repeat the steps in this section.

Modifying, Repairing, or Removing the Current Installation

To modify, repair, or remove an existing DECtalk Software installation, you can:

- Launch the Windows control panel **Add/Remove Programs** and select a DECtalk installation
- Run the program `setup.exe` from the top level of your installation CD-ROM exactly as you did for the original installation

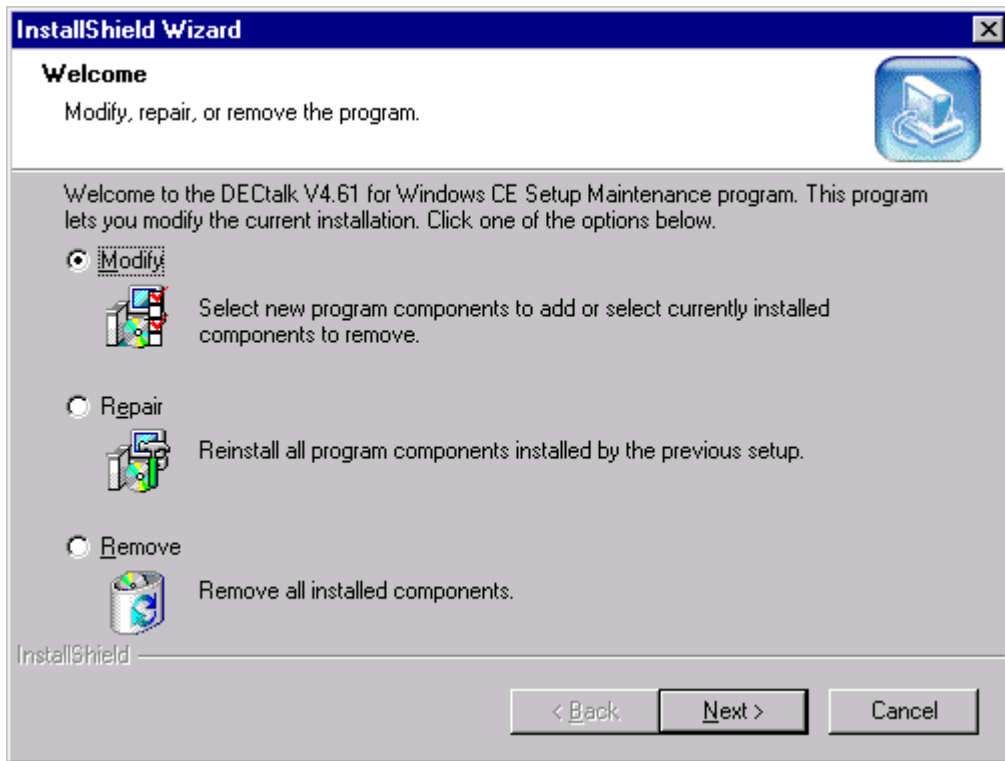
Either method reactivates the InstallShield Wizard for DECtalk Software. Subsequent InstallShield dialog leads you to the DECtalk Setup Maintenance Welcome window, shown in *Figure 2-10*.

Select the action you want to perform:

- **Modify** the current installation, adding or removing components
- **Repair** the current installation by exactly repeating the original installation
- **Remove** the current installation from the system

To proceed with the action you selected, click the **Next** button.

Figure 2-10 DECTalk Setup Maintenance Welcome Window (CE)



Modifying the Current Installation

If you specified that you wanted to **Modify** the current DECtalk SDK installation, the InstallShield Wizard displays the DECtalk Select Components window. This is the same window that is used to select DECtalk Software components in a fresh Custom installation, as shown in *Figure 2-7* (see *Selecting Components for a Custom Installation*).

By checking and unchecking boxes, you select the DECtalk Software components to be included or excluded from your installation. As you include or exclude components in the window, the Space Required field is updated to reflect the memory requirements for your selected components.

When you are ready to proceed with modifying your DECtalk SDK installation, click the **Next** button.

Once the modifications complete, you should repeat the steps listed in *Configuring the Windows CE Target System*.

Repairing the Current Installation

If you specified that you wanted to **Repair** the current DECtalk SDK installation, the InstallShield Wizard immediately repeats the previously configured installation, while displaying a Setup Status window. This window is continually updated to display the current transfer in progress and the approximate percentage of the overall installation that has been completed.

Once the previously configured installation completes, you should repeat the steps listed in *Configuring the Windows CE Target System*.

Removing the Current Installation

If you specified that you wanted to **Remove** the current DECtalk SDK installation, the InstallShield Wizard displays a Confirm File Deletion dialog box that asks you to confirm that want to completely remove the application and all of its components from the system.

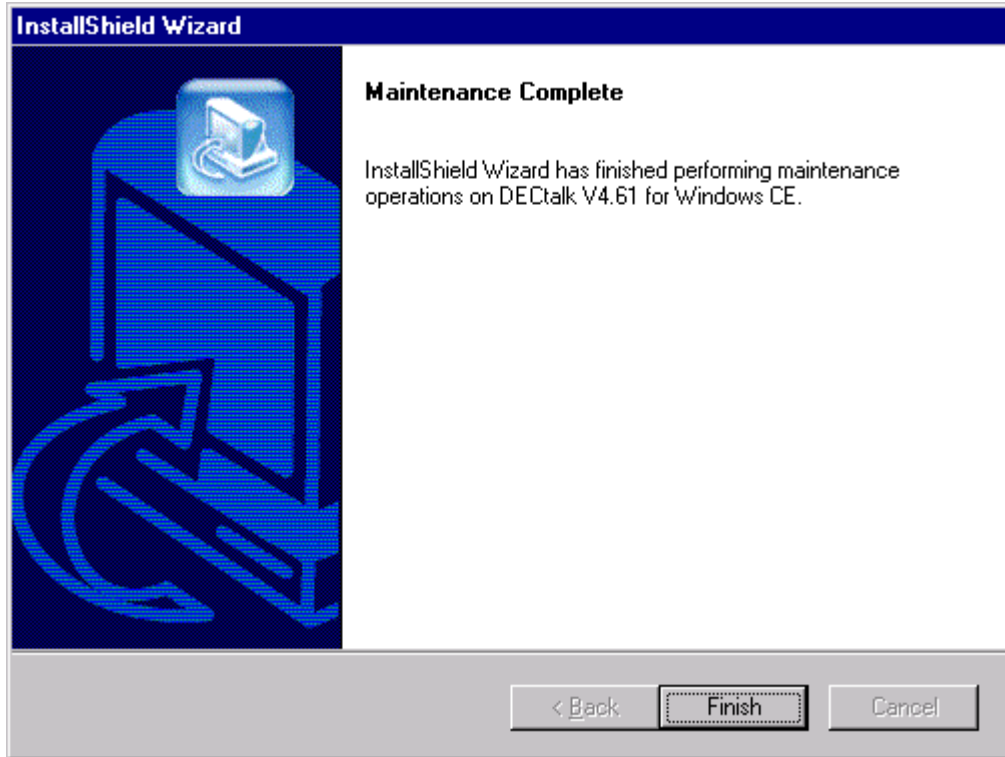
Select **OK** to completely deinstall DECtalk Software from your system.
Select **Cancel** to exit the removal procedure.

Completing DECTalk Installation Maintenance

When the SDK installation modification you requested is complete, the InstallShield Wizard displays the DECTalk Setup Maintenance Complete window, shown in *Figure 2-11*.

Click **Finish** to exit the InstallShield Wizard.

Figure 2-11 DECTalk Setup Maintenance Complete Window (CE)



Displaying Documentation

The DECTalk Software documentation is provided in PDF and other formats on the distribution CD-ROM. You can display the PDF files on your workstation using Adobe Acrobat Reader.

After a successful installation, DECTalk Software online help is accessible on the host system in the form of Windows Help. DECTalk Software Windows Help is part of the application and is easily accessed from any of the applets or from the Help icon in the DECTalk program group.

You can find specific information in Help by using keyword searches and the index. Windows Help has a powerful cross-referencing facility that allows you to access many related topics in the same session.

The DECTalk Software Windows Help file includes guide and reference information about the following DECTalk features:

- **DECTalk Software applets**
 - Select DECTalk Software and then the DECTalk Applet Master Index.
- **DECTalk Software API functions**
 - Select the Programmer's Guide and then the Introduction to the DECTalk Software API.
 - Select the Reference Guide and then DECTalk Software API Functions.
- **DECTalk Software in-line commands**

Select the Reference Guide and then one of the following:

 - DECTalk Software In-Line Commands.
 - Using In-Line Commands.

Solving Installation Problems

If errors occur during the installation procedure, DECTalk Software returns an error message. Installation errors usually occur if any of the following conditions exist:

- The operating system version is incorrect.
- The prerequisite software and hardware components or version is missing or incorrect.
- Insufficient disk space is available.
- System files and parameters are not updated to reflect exact file locations and directory naming conventions.

If you have problems while using DECTalk Software and you believe the error is caused by the application, do one of the following:

- If you purchased DECTalk Software from an Authorized Distributor or Reseller, contact your Authorized Distributor or Reseller for support.
- If you purchased or licensed DECTalk Software *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

For up-to-date information about support options, visit the Force DECTalk web site at: <http://www.forcecomputers.com/product/dectalk/dtalk.htm>.

Chapter 3 — Installing DECtalk Software for Linux

This chapter describes the tasks required to install the DECtalk Software Development Kit (SDK) for Linux on a Red Hat Linux host system running on an Intel or StrongARM processor. Topics include:

- Preparing for installation
- Installing DECtalk Software
- Displaying documentation
- Solving installation problems

The DECtalk Software documentation is provided in PDF, Postscript, and HTML file formats on the distribution CD-ROM. After a successful installation, DECtalk Software online help is accessible in the form of HTML Help and reference (man) pages. For more information, see *Displaying Documentation*.

Preparing for Installation

DECtalk Software is installed from the installation media shipped with the product. The installation should take you no longer than ten minutes to complete.

Before installing DECTalk Software:

- Make sure that all prerequisite hardware and software components are installed on your system.
- You should back up the disk or file system on which you will be installing DECTalk Software.

Note

You must have superuser privileges to install DECTalk Software.

Extract the Installation Materials

Before you can start the installation, you must select a processor architecture directory on the installation CD-ROM and extract the installation materials from a `.tar.gz` file. To extract the installation materials:

1. On the installation CD-ROM, go to the directory that corresponds to your Linux system's processor type:
 - `arm` for StrongARM
 - `intel` for Intel
2. For each processor type, two installation archives are provided:
 - `DECTalk_n.nn_xxxx.tar.gz` (standard installation – recommended)
 - `DECTalk_n.nn_xxxx_debug.tar.gz` (installation with debug symbols)

In the file names above, *n.nn* represents the DECTalk Software version (for example, 4.61) and *xxx* represents a revision value (for example, R001).

Copy the `.tar.gz` file that represents the type of installation you want to perform to a working installation directory.

Typically you would select the standard installation. Installation with debug symbols normally is reserved for troubleshooting a systematic problem and is used to generate useful information for support personnel.

3. Extract the installation materials from the `.tar.gz` file. For example:

```
% tar zxvf DECTalk_4.61_R001.tar.gz
```

Release Notes

Before you install the DECTalk Software, you should read the release notes in the `readme.txt` file found in the working installation directory. These notes contain the latest information about the DECTalk Software product.

Hardware Requirements

Hardware requirements include a standard audio sound card and adequate disk space for installation.

DECTalk Software performance is dependent on your system having enough computational power to perform all the computations involved in text-to-speech conversion.

Note

DECTalk Software performance can be affected in a heavily loaded multitasking environment where DECTalk Software could become starved for computational power and will not speak continuously. There might be pauses in output for any application running on such a system.

Audio Output Device

Your system must be configured with an audio device and appropriate driver that support 8-bit or 16-bit data format at an 11.025 kHz sample rate. You can install DECTalk Software without an audio device present and capture `.wav` audio files; however, an audio device must be present to actually have DECTalk Software speak text.

Required Disk Space and Software

DECTalk Software for Linux requires:

- A minimum of 3 MB disk space for proper configuration and installation
- Red Hat Linux Version 5.0 or higher
- Kernel 2.0.34 or higher

- `glibc V2.0 (libc6)`
- `GTK+ V1.2.7`

Installing DECtalk Software

To install DECtalk Software for Linux:

1. Review DECtalk's list of target installation directories, `locations.sh`, and make any necessary modifications.
2. Run the DECtalk installation script, `install.sh`.

If a previous version of DECtalk Software exists on your system, the new installation overwrites it.

Reviewing the List of Target Installation Directories

Before starting the DECtalk Software for Linux installation, you should examine the list of target installation directories in the file `locations.sh`, found in the working installation directory.

If you would like DECtalk Software components installed to locations other than the defaults, modify the file to specify the pathnames you desire.

Normally, you will want to preserve the hierarchy of subdirectories that are defined relative to `$BASE_DIR` in `locations.sh`.

Running the Installation Script

To install, DECtalk Software for Linux, run the script `install.sh`, found in the working installation directory.

The installation script does the following:

1. Installs software libraries to the `LIBS` directory, as defined in `locations.sh`
2. Installs dictionary files to the `DICTIONARIES` directory, as defined in `locations.sh`
3. Installs bitmap files to the `BITMAPS` directory, as defined in `locations.sh`
4. Installs text sample programs to the `TEXT_SAMPLE_PROGRAMS` directory, as defined in `locations.sh`
5. Installs graphic sample programs to the `GRAPHIC_SAMPLE_PROGRAMS` directory, as defined in `locations.sh`

6. Installs HTML, PDF, and PS documentation to `html`, `pdf`, and `ps` subdirectories of the `DOCUMENTATION` directory, as defined in `locations.sh`
7. Installs reference pages to the `MAN1` and `MAN3` directories, as defined in `locations.sh`
8. Installs sample source files to the `SAMPLE_SOURCE` directory, as defined in `locations.sh`
9. Creates the file `/etc/DEctalk.conf` and writes information to the file to record installation locations and licensing information
10. Invokes the `say` utility to speak the following:
“DEctalk Vn.nn has been successfully installed.”

When the DEctalk Software for Linux installation is complete, the script displays the following message:

```
If DEctalk just spoke, DEctalk was sucessfully installed.  
If DEctalk did not speak, your sound device may not be functioning or  
your path may not include the directory that DEctalk was installed to.  
If you have installed rsynth, rsynth installs a say program of  
its own. That may be the program that just spoke.
```

Displaying Documentation

The DECtalk Software documentation is provided in PDF, Postscript, and HTML file formats on the distribution CD-ROM. You can display the files on your workstation using Adobe Acrobat Reader, a Postscript reader, or a browser application.

After a successful installation, DECtalk Software online help is accessible in two forms:

- Reference (man) pages – Invoke reference page help for DECtalk utilities (such as **speak**) and API functions from the Linux command line with the **man** command. The reference pages are installed to the MAN1 and MAN3 directories, as defined in `locations.sh`.
- HTML Help – Start HTML Help by launching a web browser and loading the online help file `defaultdectalk.html`. The HTML Help files are installed to the `html` subdirectory of the `DOCUMENTATION` directory, as defined in `locations.sh`.

The DECtalk Software HTML Help files include guide and reference information about the following DECtalk features:

- **DECtalk Software applets**
 - Select DECtalk Software and then the DECtalk Applet Master Index.
- **DECtalk Software API functions**
 - Select the Programmer's Guide and then the Introduction to the DECtalk Software API.
 - Select the Reference Guide and then DECtalk Software API Functions.
- **DECtalk Software in-line commands**
 - Select the Reference Guide and then one of the following:
 - DECtalk Software In-Line Commands.
 - Using In-Line Commands.

Additionally, PDF and Postscript files of the DECtalk Software manuals can be found in the `pdf` and `ps` subdirectories of the `DOCUMENTATION` directory, as defined in `locations.sh`.

Solving Installation Problems

If errors occur during the installation procedure, DECTalk Software returns an error message. Installation errors usually occur if any of the following conditions exist:

- The operating system version is incorrect.
- The prerequisite software and hardware components or version is missing or incorrect.
- Insufficient disk space is available.
- System files and parameters are not updated to reflect exact file locations and directory naming conventions.

If you have problems while using DECTalk Software and you believe the error is caused by the application, do one of the following:

- If you purchased DECTalk Software from an Authorized Distributor or Reseller, contact your Authorized Distributor or Reseller for support.
- If you purchased or licensed DECTalk Software *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

For up-to-date information about support options, visit the Force DECTalk web site at: <http://www.forcecomputers.com/product/dectalk/dtalk.htm>.

Chapter 4 — Installing DECtalk Software for Tru64 UNIX

This chapter describes the tasks required to install DECtalk runtime and development software on Tru64 UNIX systems. Topics include:

- Differences between the DECtalk Software Runtime Kit and the DECtalk Software Development Kit
- License requirements
- Installing DECtalk Runtime Software for Tru64 UNIX
- Installing DECtalk Development Software for Tru64 UNIX

What's the Difference Between the DECTalk Software Runtime Kit and the DECTalk Software Development Kit?

DECTalk Software for Tru64 UNIX is packaged as a runtime kit and a development kit. The runtime kit gives you access to the following DECTalk Software applications: **say**, **speak**, **emacspeak**, **aclock**, and **windict**.

To develop your own DECTalk Software applications, you must order the DECTalk Software Development Kit. The DECTalk Software Development Kit gives you access to the DECTalk Software API and sources for some sample application programs.

Note

You must install the runtime kit before you install the development kit.

License Requirements

You can run one copy of any DECTalk Software application at a time without needing an LMF license. A license is required to run more than one copy of the runtime kit or to use the DECTalk Software Development Kit. See *Registering Your Software Licenses* under each software kit for more information.

Installing DECtalk Runtime Software for Tru64 UNIX

This section describes the preinstallation, installation, and post-installation tasks required to install the DECtalk Software runtime kit on Tru64 UNIX systems. Topics include:

- Preinstallation tasks
 - Accessing the Release Notes
 - Registering your software licenses
 - Checking the software distribution kit
 - Meeting hardware requirements
 - Meeting software requirements
 - Checking current disk space
 - Increasing disk space by using alternative disks
- Installation procedure
 - Using the CD-ROM distribution media
 - Using an RIS distribution area
 - Starting the installation procedure
 - Selecting subsets
 - Stopping the installation
- Post-installation tasks
 - Running the installation verification procedure
 - Deleting DECtalk software from your system
 - Displaying documentation
 - Correcting problems during product installation
 - Reporting problems

The runtime software installation procedure installs all files in subdirectories under:

```
/usr/opt/DTKRT461
```

The DECtalk Software documentation is provided in PDF, Postscript, and HTML file formats on the distribution CD-ROM. After a successful installation, DECtalk Software online help is accessible in the form of HTML Help and reference (man) pages. For more information, see *Displaying Documentation*.

Preinstallation Tasks

This section covers the preinstallation tasks you must perform before installing the DECtalk Software runtime kit. Topics include:

- Accessing the Release Notes
- Registering your software licenses
- Checking the software distribution kit
- Meeting hardware requirements
- Meeting software requirements
- Checking current disk space
- Increasing disk space by using alternative disks

Accessing the Release Notes

DECtalk Software provides release notes containing information about changes to DECtalk Software for Tru64 UNIX. You should read these release notes before using the product. See the *Compact Disc User's Guide* shipped with your media for instructions about how to access the release notes prior to the software installation.

The release notes for the DECtalk Software runtime kit are in the following files after the DTKRTRELNOTES461 subset is installed:

```
/usr/opt/DTKRT461/docs/ascii/release_notes_rt.txt  
/usr/opt/DTKRT461/docs/postscript/release_notes_rt.ps
```

To read the release notes for DECtalk Software use the following command:

```
# more  
/usr/opt/DTKRT461/docs/ascii/release_notes_rt.txt
```

You can also print either file.

Registering Your Software Licenses

DECtalk Software includes support for the License Management Facility (LMF). You must register your license product authorization keys (License PAKs) in the license database (LDB) to use DECtalk Software on a newly licensed system. The License PAKs are shipped with the kit if you ordered the

licenses and media together; otherwise, they are shipped separately to a location specified on your license order.

LMF keys are created by Compaq Computer Corporation. Because of the transition of DECTalk Software from Compaq to Force Computers, Inc., the source of LMF keys may be uncertain temporarily. Contact your Authorized Distributor or Reseller or, if you licensed or purchased DECTalk Software *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

Note

You must have superuser privileges to install the DECTalk Software and to register the license PAK.

If you are installing DECTalk Software as an update on a node already licensed for this software, you have already completed the License PAK registration requirements.

To register a license under the Tru64 UNIX operating system:

1. Log in as root.
2. At the superuser prompt, edit an empty PAK template with the `lmf register` command as follows, and include all the information on your License PAK:

```
# lmf register
```

LMF displays a blank template and invokes an editor to allow you to edit the template. LMF invokes the editor that is defined by your EDITOR environment variable. If the environment variable is undefined, LMF invokes the vi editor.

You must enter the license information from the PAK accurately.

3. When you finish entering the license data, exit from the editor. If the license data is correct, LMF copies it into the license database. If the license data is incorrect, you may reenter the editor and correct mistakes.

Alternatively, you can create a command script enclosing the license information (the license information is in the cover letter with this kit) found between

```
lmf register - << ENDLMF
```

and

```
ENDLMF
```

Execute this script as root.

4. After you register your license, use the following commands to copy the license details from the license database (LDB) to the kernel cache:

```
# lmf load 0 DECTALK-SW97-USER
```

For complete information on using the License Management Facility, see the *Guide to Software License Management* and the **lmf** reference page.

Checking the Software Distribution Kit

Check the contents of your DECTalk Software distribution kit. It should include the following:

- CD-ROM optical disc for systems with optical disc drives
- CD-ROM booklet

If your software distribution kit is damaged or incomplete, contact your Authorized Distributor or Reseller or, if you purchased or licensed the product *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

Directories and files included in the distribution kit are listed in the following screen display:

```
/usr/opt/DTKRT461/docs/ascii:
dtk461_release_notes_rt.txt filelist_rt.txt

/usr/opt/DTKRT461/docs/html:
defaultdectalk.html
<long list of html files omitted here>

/usr/opt/DTKRT461/docs/man/man1:
aclock.1      emacspeak.1  speak.1
dectalk.1    say.1       windict.1

/usr/opt/DTKRT461/docs/postscript:
dtk461_release_notes_rt.ps

/usr/opt/DTKRT461/emacspeak/Macros:
HELP emacspeak-ispell.el
Makefile emacspeak-keymap.el
dtk-macros.el emacspeak-kotl.el
```

```

dtk-mme* emacspeak-load-path.def
dtk-sh.el emacspeak-oo-browser.el
dtk-spatial.el emacspeak-outline.el
dtk-speak.el emacspeak-perl.el
dtk-voices.el emacspeak-redefine.el
emacspeak-advice.el emacspeak-replace.el
emacspeak-auctex.el emacspeak-setup.def
emacspeak-bbdb.el emacspeak-sounds.el
emacspeak-c.el emacspeak-speak.el
emacspeak-calc.el emacspeak-tabulate.el
emacspeak-calendar.el emacspeak-tcl.el
emacspeak-compile.el emacspeak-tempo.el
emacspeak-dired.el emacspeak-vm.el
emacspeak-dmacro.el emacspeak-w3.el
emacspeak-ediff.el emacspeak-wrolo.el
emacspeak-eterm.el emacspeak.def
emacspeak-fix-interactive.el emacspeak.el
emacspeak-folding.el html-voice.el
emacspeak-gnus.el play.def
emacspeak-hyperbole.el voice-lock.el
emacspeak-info.el w3-util.el

/usr/opt/DTKRT461/emacspeak/docs/ascii:
emacspeak-README.txt

/usr/opt/DTKRT461/emacspeak/docs/postscript:
emacspeak.ps

/usr/opt/DTKRT461/etc/dt/appconfig/appmanager/C/Multimedia
:
dtk_speak* dtk_windict*

/usr/opt/DTKRT461/etc/dt/appconfig/icons/C:
dtk_speak.s.bm dtk_windict.m.bm
dtk_speak.s.pm dtk_windict.m.pm
dtk_speak.l.bm dtk_speak.t.bm dtk_windict.s.bm
dtk_speak.l.pm dtk_speak.t.pm dtk_windict.s.pm
dtk_speak.m.bm dtk_windict.l.bm dtk_windict.t.bm
dtk_speak.m.pm dtk_windict.l.pm dtk_windict.t.pm

/usr/opt/DTKRT461/etc/dt/appconfig/types/C:
dtk_speak.dt dtk_windict.dt

/usr/opt/DTKRT461/examples/dtk/dtsamples:
aclock* demo.txt say* user.dic
birthday.txt noglass.txt startup.txt user.tab

/usr/opt/DTKRT461/examples/dtk/speak:
bitmaps/ speak* speak.uid

/usr/opt/DTKRT461/examples/dtk/speak/bitmaps:
bet16a.gif dtk.gif har16b.gif paul16b.gif urs16b.gif

```

```
bet16b.gif fra16a.gif kid16a.gif rit16a.gif wen16a.gif
den16a.gif fra16b.gif kid16b.gif rit16b.gif wen16b.gif
den16b.gif har16a.gif paul16a.gif urs16a.gif windict.gif
```

```
/usr/opt/DTKRT461/ivp:
DTKRT461.ivp
```

```
/usr/opt/DTKRT461/lib/dtk:
dectalk.dic dtalk_la.dic dtalk_uk.dic
dtalk_gr.dic dtalk_sp.dic dtalk_us.dic
```

```
/usr/opt/DTKRT461/share/man/man1:
```

```
aclock.ldtk  emacspeak.ldtk  speak.ldtk
dectalk.ldtk say.ldtk      windict.ldtk
```

```
/usr/opt/DTKRT461/shlib:
libtts.so* libttsmme.so*
```

```
/usr/opt/DTKRT461/tools:
dumpdict* userdict* windict* windict.uid
```

Meeting Hardware Requirements

To install DECTalk Software, you need the following:

- Software distribution device (if installing from media)
- A drive for the CD-ROM software distribution media. The CD booklet or the documentation for the CD-ROM drive you are using explains how to load the CD-ROM media.
- A terminal. You can use either a hardcopy or video terminal to communicate with the operating system and respond to the prompts from the installation procedure.

Meeting Software Requirements

DECTalk Software for Tru64 UNIX Version 4.61 requires the Tru64 UNIX operating system Version 4.x. Force also strongly recommends Multimedia Services for Tru64 UNIX V2.x for use with the runtime kit.

Checking Current Disk Space

To check the current amount of free space for a directory path, log into the system where you will install DECTalk Software. You can check which directories are mounted and their locations by viewing the `/etc/fstab` file.

For example:

```
# more /etc/fstab
/dev/rz3a / ufs rw 1 1
/dev/rz3g /usr ufs rw 1 2
/dev/rz3b swap1 ufs sw 0 2
```

The display indicates that `/usr` mounted on `/dev/rz3g` is the only mount point that affects where DECtalk Software files will reside; the system has only one local disk drive, and the `/usr/opt` file system resides in the `g` partition of the disk on that drive.

To check the total space and the free space for the directories where DECtalk Software will reside, enter the `df` command. Given the previous display of the `/etc/fstab` file, which shows that only `/usr` is a mount point, you need to check free space only in the `/usr` file system. For example:

```
# df /usr
Filesystem 512-blocks  Used  Avail  Capacity Mounted on
/dev/rz3a   79608      45648 25998  64%      /
/dev/rz3g  1482190    921846 412124 69%      /usr
```

This display shows that there are 206062 kbytes free on the `/usr` file system. This free space must accommodate the subsets that you opt to install. If you choose to install all the subsets in the DECtalk Software Runtime kit you will need approximately 11 MB of free disk space. Of this, the unsupported Emacspeak subset uses 2 MB.

Increasing Disk Space by Using Alternative Disks

The DECtalk Software installation procedure creates and loads files into the subordinate directory:

```
/usr/opt/DTKRT461
```

If any of the previously listed directories already exists, the installation procedure uses it.

If you find that there is insufficient disk space for the DECtalk Software subsets and you know that you have additional space on alternative disks or disk partitions for your system, perform the following steps before installing DECtalk Software:

1. Log in as superuser.
2. Create the following directory:

```
/usr/opt/DTKRT461
```

3. Specify in the `/etc/fstab` file that one or more of the newly created directories are mount points to new disk partitions where there is additional space.
4. Enter the `mount -a` command so that the new mount points take effect.

Installation Procedure

This section explains how to install the DECtalk Software runtime kit. Topics include:

- Using the CD-ROM distribution media
- Using an RIS distribution area
- Starting the installation procedure
- Selecting subsets
- Stopping the installation

Installing DECtalk Software takes approximately 5 minutes, depending on your type of media and system configuration.

Using the CD-ROM Distribution Media

The following procedure loads DECtalk Software files onto a disk belonging to the system where you perform the installation. When DECtalk Software is run, its executable images are mapped into memory on your system.

To install DECtalk Software from CD-ROM media:

1. Mount the media on the appropriate disk drive.
2. Log in as superuser login name `root` to the system where you will install DECtalk Software.
3. Make sure that you are at the root (`/`) directory by entering the following command:

```
# cd /
```
4. Specify the `/cdrom` directory to be the mount point for the distribution file system on the drive. If your drive is `rz4c`, enter the following command:

```
# mount -dr /dev/rz4c /cdrom
```

5. Enter a `setld` command that requests the load function `-l` and identifies the directory in the mounted file system where DECtalk Software subsets are located. For example, if the directory location for these subsets is `/cdrom/4.0/RT/`, enter the following command:

```
# /usr/sbin/setld -l /cdrom/4.0/RT/
```

6. The installation procedure now displays the names of DECtalk Software runtime kit subsets and asks you to specify the subsets you want to load.

See *Starting the Installation Procedure* to continue the installation.

Using an RIS Distribution Area

If you are installing DECtalk Software subsets that reside in an `/etc/ris` RIS distribution area on a remote system, take the following steps:

1. Log in as superuser login name `root` to the system where you will install DECtalk Software runtime kit.

2. Make sure that you are at the root directory (`/`) by entering the following command:

```
# cd /
```

3. Enter a `setld` command that requests the load function (`-l`) option and identifies the system where the DECtalk Software subsets are located. For example, if you are loading DECtalk Software subsets from a RIS distribution area on node `axpmme`, enter the following:

```
/usr/bin/setld -l axpmme
```

4. RIS now displays a menu that lists all the software subsets available to you and asks you to specify the subsets you want to load.

See *Starting the Installation Procedure* to continue the installation.

Starting the Installation Procedure

Before starting the installation procedure:

1. Log in as a superuser and verify that you are at the root directory. Check to see if there are any previously installed DECtalk Software subsets by entering the following commands:

```
% su root
# cd /
# /usr/sbin/setld -i | grep DTK
```

2. Deinstall any installed subsets with the prefix DTK by entering the following commands:

```
# cd /  
# /usr/sbin/setld -d (name of subset)
```
3. Start the installation procedure by entering the following command:

```
# /usr/sbin/setld -l /dev/rmt0h
```
4. Respond to the installation procedure prompts as described in Selecting Subsets.

Selecting Subsets

This section presents a complete installation procedure, including all messages that are displayed on your screen during the installation.

You must specify which DECTalk Software subsets you want to load. If you specify more than one number at the prompt, separate each number with a space, not a comma.

```
# /usr/sbin/setld -l /cdrom/4.0/RT/  
The subsets listed below are optional:  
There may be more optional subsets than can be presented on a single  
screen. If this is the case, you can choose subsets screen by screen or  
all at once on the last screen. All of the choices you make will be  
collected for your confirmation before any subsets are installed.  
1) DECTalk Software V4.61 for Tru64 UNIX CDE Integration.  
2) DECTalk Software V4.61 for Tru64 UNIX Release Notes.  
3) DECTalk Software V4.61 for Tru64 UNIX Runtime Kit.  
4) DECTalk Software V4.61 for Tru64 UNIX Documentation.  
5) Emacspeak, Speech Enabled Emacs - Sample Program (unsupported).
```

Or you may choose one of the following options:

- 6) ALL of the above
- 7) CANCEL selections and redisplay menus
- 8) EXIT without installing any subsets

Enter your choices or press RETURN to redisplay menus.

Choices (for example, 1 2 4-6): 6

Next, the script lets you verify your choice. For example, if you enter 6 in response to the previous prompt, you will see the following display:

```
You are installing the following optional subsets:  
DECTalk Software V4.61 for Tru64 UNIX CDE Integration.  
DECTalk Software V4.61 for Tru64 UNIX Release Notes.  
DECTalk Software V4.61 for Tru64 UNIX Runtime Kit.  
DECTalk Software V4.61 for Tru64 UNIX Documentation.  
Emacspeak, Speech Enabled Emacs - Sample Program.  
Is this correct? (y/n):
```


If the displayed subsets are not the ones you intended to choose, enter n. In this case, the subset selection menu is displayed again and you can correct your choice of optional subsets. If the displayed subsets are the ones you want to load, enter y. After you respond to this question, the rest of the installation proceeds automatically and all the selected subsets are loaded. A sample of the rest of the installation script is listed below.

Checking file system space required to install selected subsets:
File system space checked OK.
5 subset(s) will be installed.
Loading 1 of 5 subset(s)....

```
*****
*
*   DECTalk Software Application Services V4.61
*   Runtime Subset
*
*   Copyright©Force Computers, Inc., 2000 All Rights Reserved
*
*   Unpublished rights reserved under the copyright laws of the United
*   States. The software contained on this media is proprietary to
*   and embodies the confidential technology of Force Computers, Inc.
*   Possession, use, duplication or dissemination of the
*   software and media is authorized only pursuant to a valid written
*   license from Force Computers, Inc.
*
*****
```

DECTalk Software V4.61 for Tru64 UNIX Runtime Kit.
Copying from . (disk)
Verifying

Loading 2 of 5 subset(s)....
DECTalk Software V4.61 for Tru64 UNIX Runtime Users Guide.
Copying from . (disk)
Verifying

Loading 3 of 5 subset(s)....
DECTalk Software V4.61 for Tru64 UNIX Release Notes.
Copying from . (disk)
Verifying

Loading 4 of 5 subset(s)....

```
*****
*
*   DECTalk Software Application Services V4.61
*   Emacspeak Subset
*
*   Copyright©Force Computers, Inc., 2000 All Rights Reserved
*
*   Unpublished rights reserved under the copyright laws of the United
*   States. The software contained on this media is proprietary to
*
*****
```

- and embodies the confidential technology of Force Computers, Inc. *
 - Possession, use, duplication or dissemination of the *
 - software and media is authorized only pursuant to a valid written *
 - license from Force Computers, Inc. *
- * *

.....

Emacspeak, Speech Enabled Emacs - Sample Program.
 Copying from . (disk)
 Verifying

Loading 5 of 5 subset(s)....
 DEctalk Software V4.61 for Tru64 UNIX CDE Integration.
 Copying from . (disk)
 Verifying

5 of 5 subset(s) installed successfully.

.....

DEctalk Software V4.61 runtime subset (DTKRT461) installation completed successfully.

To verify that the kit installed properly please run the Installation Verification Program by typing:
 /usr/sbin/setld -v DTKRT461

.....

Configuring "DEctalk Software V4.61 for Tru64 UNIX Runtime Kit."
 (DTKRT461)

.....

DEctalk Software V4.61 runtime documentation subset (DTKRTDOC461) installation completed successfully. This installation puts the DEctalk Software online help in html format in the following directory:
 /usr/opt/DTKRT461/docs/html
 You can view the online help with a web browser. Open the file
 /usr/opt/DTKRT461/docs/html/defaultdectalk.html

.....

Configuring "DEctalk Software V4.61 for Tru64 UNIX Documentation."
 (DTKRTDOC461)

*****<>

DEctalk Software V4.61 runtime release notes subset (DTKRTRELNOT461) installation completed successfully. This installation put DEctalk Software development subset release notes in the following directories:
 /usr/opt/DTKRT461/docs/ascii and
 /usr/opt/DTKRT461/docs/postscript

*****<>

```
Configuring "DECTalk Software V4.61 for Tru64 UNIX Release Notes."
(DTKRTRELN0T461)
```

```
DECTalk Software V4.61 runtime subset (DTKEMSRT461) installation
completed successfully.
To run the program, please refer to the emacspeak-README.txt file
in:
/usr/opt/DTKRT461/emacspeak/docs/ascii
```

```
Configuring "Emacspeak, Speech Enabled Emacs - Sample Program."
(DTKEMSRT461)
```

```
*****<>
```

```
DECTalk Software V4.61 CDE Integration subset (DTKRTCDE461) installation
completed successfully.
```

```
*****<>
```

```
Configuring "DECTalk Software V4.61 for Tru64 UNIX CDE Integration."
(DTKRTCDE461)
```

```
#
```

Stopping the Installation

To stop the installation procedure at any time, press Ctrl/C. Then, interactively delete the files created by the installation up to the point where you stopped the installation. The directories and files created during the DECTalk Software installation are listed in the following file:

```
/usr/opt/DTKRT461/docs/ascii/filelist.txt
```

If you encounter any failures during installation, see *Reporting Problems*.

You may interrupt the installation procedure at any point. However, if you do, the installation may not be left in a useful state. Remove all the subsets you installed and reinstall them.

Post-Installation Tasks

This section explains the post-installation tasks you need to do after the runtime kit installation to make DECTalk Software ready for use. Topics include:

- Running the installation verification procedure
- Deleting DECTalk Software from your system

- Displaying documentation
- Correcting problems during product installation
- Reporting problems

Running the Installation Verification Procedure

You can run the Installation Verification Procedure (IVP) during the installation or you can run the IVP independently after installing DECtalk Software to verify that the software is available on your system. You might also want to run the IVP after a system failure to be sure that users can access DECtalk Software.

To run the IVP, enter these commands:

```
% su root
#/usr/sbin/setld -v DTKRT461
```

The DECtalk Software IVP verifies the installation as follows:

1. A check for a valid LMF license is made. If no license is found, the IVP fails because the software cannot be tested.
2. DECtalk Software requires that the Multimedia Software for Tru64 UNIX server mmeserver be up and running. If the mmeserver is not already running then the IVP fails. Start the server and try again. To start the server follow the sequence shown below:

```
% su root
# mmeserver&
```

Deleting DECtalk Software from Your System

If you must remove a version of DECtalk Software from your system, delete each subset that you previously installed.

For example to delete a subset, do the following:

1. Log in as superuser login name root, as follows:


```
% su root
```
2. Verify that you are at the root directory (/) by entering the following command:


```
# cd /
```
3. Enter the following form of the setld command:


```
# setld -i | grep DTK
```

4. Look for the word “installed” in the listing produced, and then delete the installed subsets. For example:

```
# setld -d DTKRT461
# setld -d DTKDEV461
```

Displaying Documentation

The DECtalk Software documentation is provided in PDF, Postscript, and HTML file formats on the distribution CD-ROM. You can display the files on your workstation using Adobe Acrobat Reader, a Postscript reader, or a browser application.

After a successful installation, DECtalk Software online help is accessible in two forms:

- Reference (man) pages – Invoke reference page help from the UNIX command line with the **man speak** command. The DECtalk utility reference pages are installed to the `docs/man/man1` subdirectory of the Runtime Kit directory tree.
- HTML Help – Start HTML Help by launching a web browser and loading the online help file `defaultdectalk.html`. This file can be accessed on the CD-ROM or in the `docs/html` subdirectory of the Runtime Kit directory tree.

The DECtalk Software HTML Help files include guide and reference information about the following DECtalk features:

- **DECtalk Software applets**
 - Select DECtalk Software and then the DECtalk Applet Master Index.
- **DECtalk Software in-line commands**

Select the Reference Guide and then one of the following:

 - DECtalk Software In-Line Commands.
 - Using In-Line Commands.

Correcting Problems During Product Installation

If errors occur during the installation, the system displays failure messages. For example, if the installation fails due to insufficient disk space, a message similar to the following is displayed:

```
There is not enough space for subset SUBSET_NAME
SUBSET_DESCRIPTION (SUBSET_NAME) will not be loaded.
```

where SUBSET_NAME is the name of the subset and SUBSET_DESCRIPTION is the description of the subset.

For example, DTKRTRELNOT461 is a subset name and DECtalk Software for Tru64 UNIX Release Notes V4.61 is a subset description.

Errors can occur during the installation if any of the following conditions exist:

- Operating system version is incorrect.
- Prerequisite software version is incorrect.
- Disk space is insufficient.
- System parameter values for successful installation are insufficient.

For descriptions of error messages generated by these conditions, see the Tru64 UNIX documentation on system messages, recovery procedures, and software installation.

Reporting Problems

If an error occurs while DECtalk Software is in use and you believe the error is caused by a problem with the product, take one of the following actions:

- If you purchased DECtalk Software from an Authorized Distributor or Reseller, contact your Authorized Distributor or Reseller for support.
- If you purchased or licensed DECtalk Software *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

For up-to-date information about support options, visit the Force DECtalk web site at: <http://www.forcecomputers.com/product/dectalk/dtalk.htm>.

Installing DECtalk Software Development Kit for Tru64 UNIX

This section describes the preinstallation, installation, and post-installation tasks required to install the DECtalk Software development kit on Tru64 UNIX systems. Topics include:

- Preinstallation tasks
 - Accessing the Release Notes
 - Registering your software licenses
 - Checking the software distribution kit
 - Meeting hardware requirements
 - Meeting software requirements
 - Checking current disk space
 - Increasing disk space by using alternative disks
- Installation procedure
 - Using the CD-ROM distribution media
 - Using an RIS distribution area
 - Starting the installation procedure
 - Selecting subsets
 - Stopping the installation
- Post-installation tasks
 - Running the installation verification procedure
 - Deleting DECtalk Software from your system
 - Displaying documentation
 - Correcting problems during product installation
 - Reporting problems

The development software installation procedure installs all files in subdirectories under:

```
/usr/opt/DTKDEV461
```

The DECtalk Software documentation is provided in PDF, Postscript, and HTML file formats on the distribution CD-ROM. After a successful installation, DECtalk Software online help is accessible in the form of HTML Help and reference (man) pages. For more information, see *Displaying Documentation*.

Preinstallation Tasks

This section covers the preinstallation tasks you must perform before installing the DECtalk Software development kit. Topics include:

- Accessing the Release Notes
- Registering your software licenses
- Checking the software distribution kit
- Meeting hardware requirements
- Meeting software requirements
- Checking current disk space
- Increasing disk space by using alternative disks

Accessing the Release Notes

DECtalk Software provides release notes containing information about changes to DECtalk Software for Tru64 UNIX. You should read these release notes before using the product. See the *Compact Disc User's Guide* shipped with your media for instructions about how to access the release notes prior to the software installation.

The release notes for the DECtalk Software development kit are in the following files after the DTKDEVRELNOTES461 subset is installed:

```
/usr/opt/DTKDEV461/docs/ascii/release_notes_dev.txt  
/usr/opt/DTKDEV461/docs/postscript/release_notes_dev.ps
```

To read the release notes for DECtalk Software use the following command:

```
# more /usr/opt/DTKDEV461/docs/ascii/release_notes_dev.txt
```

You can also print either file.

Registering Your Software Licenses

DECtalk Software includes support for the License Management Facility (LMF). You must register your license product authorization keys (License PAKs) in the license database (LDB) in order to use DECtalk Software on a newly licensed system. The License PAKs are shipped with the kit if you ordered the licenses and media together; otherwise, they are shipped separately to a location specified on your license order.

LMF keys are created by Compaq Computer Corporation. Because of the transition of DECtalk Software from Compaq to Force Computers, Inc., the source of LMF keys may be uncertain temporarily. Contact your Authorized Distributor or Reseller or, if you licensed or purchased DECtalk Software *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

Note

You must have superuser privileges to install the DECtalk Software and to register the license PAK.

If you are installing DECtalk Software as an update on a node already licensed for this software, you have already completed the License PAK registration requirements.

To register a license under the Tru64 UNIX operating system:

1. Log in as root.
2. At the superuser prompt, edit an empty PAK template with the `lmf register` command as follows, and include all the information on your License PAK:

```
# lmf register
```

LMF displays a blank template and invokes an editor to allow you to edit the template. LMF invokes the editor that is defined by your `EDITOR` environment variable. If the environment variable is undefined, LMF invokes the `vi` editor.

You must enter the license information from the PAK accurately.

3. When you finish entering the license data, exit from the editor. If the license data is correct, LMF copies it into the license database. If the license data is incorrect, you may reenter the editor and correct mistakes.

Alternatively, you can create a command script enclosing the license information (the license information is in the cover letter with this kit) found between

```
lmf register - << ENDLMF
```

and

```
ENDLMF
```

Execute this script as root.

4. After you register your license, use the following commands to copy the license details from the license database (LDB) to the kernel cache:

```
# lmf load 0 DECTALK-SW97-USER
```

For complete information on using the License Management Facility, see the *Guide to Software License Management* and the **lmf** reference page.

Checking the Software Distribution Kit

Use the bill of materials (BOM) to check the contents of your DECTalk Software distribution kit.

In addition to this guide, the software distribution kit includes the following:

- CD-ROM optical disc for systems with optical disc drives
- CD-ROM booklet

If your software distribution kit is damaged or incomplete, contact your Authorized Distributor or Reseller or, if you purchased or licensed the product *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

Directories and files included in the distribution kit are listed in the following screen display:

```
/usr/opt/DTKDEV461/docs/ascii:  
dtk461_prog_guide.txt filelist_dev.txt  
dtk461_release_notes_dev.txt
```

```
/usr/opt/DTKDEV461/docs/html:  
defaultdectalk.html  
<long list of html files omitted here>
```

```
/usr/opt/DTKDEV461/docs/man/man3:  
TextToSpeechAddBuffer.3      TextToSpeechReset.3  
TextToSpeechCloseInMemory.3  TextToSpeechResume.3  
TextToSpeechCloseLang.3     TextToSpeechReturnBuffer.3  
TextToSpeechCloseLogFile.3  TextToSpeechSelectLang.3  
TextToSpeechCloseWaveOutFile.3 TextToSpeechSetLanguage.3  
TextToSpeechEnumLangs.3     TextToSpeechSetRate.3  
TextToSpeechGetCaps.3       TextToSpeechSetSpeaker.3  
TextToSpeechGetFeatures.3   TextToSpeechShutdown.3  
TextToSpeechGetLanguage.3   TextToSpeechSpeak.3  
TextToSpeechGetRate.3       TextToSpeechStartup.3  
TextToSpeechGetSpeaker.3    TextToSpeechStartupEx.3  
TextToSpeechGetStatus.3     TextToSpeechSync.3
```

```

TextToSpeechLoadUserDictionary.3 TextToSpeechTyping.3
TextToSpeechOpenInMemory.3      TextToSpeechUnloadUserDictionary.3
TextToSpeechOpenLogFile.3       TextToSpeechVersion.3
TextToSpeechOpenWaveOutFile.3   TextToSpeechVersionEx.3
TextToSpeechPause.3

/usr/opt/DTKDEV461/docs/postscript:
dtk461_prog_guide.ps  dtk461_release_notes_dev.ps

/usr/opt/DTKDEV461/examples/dtk/dtsamples:
Imakefile  aclock.c  say.c  xmsay.uil
README.txt dtmemory.c xmsay.c

/usr/opt/DTKDEV461/include/dtk:
dtmmedefs.h  engphon.h  l_sp_ph.h  l_us_ph.h
dtmmiodefs.h l_gr_ph.h  l_uk_ph.h  ttsapi.h

/usr/opt/DTKDEV461/share/man/man3:
TextToSpeechAddBuffer.3dtk      TextToSpeechReset.3dtk
TextToSpeechCloseInMemory.3dtk  TextToSpeechResume.3dtk
TextToSpeechCloseLang.3dtk      TextToSpeechReturnBuffer.3dtk
TextToSpeechCloseLogFile.3dtk   TextToSpeechSelectLang.3dtk
TextToSpeechCloseWaveOutFile.3dtk TextToSpeechSetLanguage.3dtk
TextToSpeechEnumLangs.3dtk      TextToSpeechSetRate.3dtk
TextToSpeechGetCaps.3dtk        TextToSpeechSetSpeaker.3dtk
TextToSpeechGetFeatures.3dtk    TextToSpeechShutdown.3dtk
TextToSpeechGetLanguage.3dtk    TextToSpeechSpeak.3dtk
TextToSpeechGetRate.3dtk        TextToSpeechStartup.3dtk
TextToSpeechGetSpeaker.3dtk     TextToSpeechStartupEx.3dtk
TextToSpeechGetStatus.3dtk      TextToSpeechSync.3dtk
TextToSpeechLoadUserDictionary.3dtk TextToSpeechTyping.3dtk
TextToSpeechOpenInMemory.3dtk   TextToSpeechUnloadUserDictionary.3dtk
TextToSpeechOpenLogFile.3dtk    TextToSpeechVersion.3dtk
TextToSpeechOpenWaveOutFile.3dtk TextToSpeechVersionEx.3dtk
TextToSpeechPause.3dtk

```

Meeting Hardware Requirements

To install DECtalk Software, you need the following:

- A software distribution device (if installing from media)
- A drive for the CD-ROM software distribution media. The CD booklet or the documentation for the CD-ROM drive you are using explains how to load the CD-ROM media.
- A terminal. You can use either a hardcopy or video terminal to communicate with the operating system and respond to the prompts from the installation procedure.

Meeting Software Requirements

DECtalk Software for Tru64 UNIX Version 4.61 requires:

- The Tru64 UNIX operating system, Version 4.x.
- The Multimedia Services for Tru64 UNIX Version 2.x.
- The Realtime extension.
- DECtalk Software runtime kit V4.61.

Checking Current Disk Space

To check the current amount of free space for a directory path, log in to the system where you will install DECtalk Software. You can check which directories are mounted and their locations by viewing the `/etc/fstab` file. For example:

```
# more /etc/fstab
/dev/rz3a / ufs rw 1 1
/dev/rz3g /usr ufs rw 1 2
/dev/rz3b swap1 ufs sw 0 2
```

The display indicates that `/usr` mounted on `/dev/rz3g` is the only mount point that affects where DECtalk Software files will reside; the system has only one local disk drive, and the `/usr/opt` file system resides in the `g` partition of the disk on that drive.

To check the total space and the free space for the directories where DECtalk Software will reside, enter the `df` command. Given the previous display of the `/etc/fstab` file, which shows that only `/usr` is a mount point, you need to check free space only in the `/usr` file system. For example:

```

# df /usr
Filesystem      512-blocks  Used   Avail   Capacity  Mounted
on
/dev/rz3a       79608      45648  25998   64%       /
/dev/rz3g      1482190    921846 412124  69%       /usr

```

This display shows that there are 206062 kbytes free on the /usr file system. This free space must accommodate the subsets that you opt to install. If you choose to install all the subsets in the DECtalk Software development kit you need approximately 2 MB of free disk space.

Increasing Disk Space by Using Alternative Disks

The DECtalk Software installation procedure creates and loads files into the sub directory:

```
/usr/opt/DTKDEV461
```

If any of the previously listed directories already exists, the installation procedure uses it.

If you find that there is insufficient disk space for the DECtalk Software subsets and you know that you have additional space on alternative disks or disk partitions for your system, perform the following steps before installing DECtalk Software:

1. Log in as root
2. Create the directory /usr/opt/DTKDEV461
3. Specify in the /etc/fstab file that one or more of the newly created directories are mount points to new disk partitions where there is additional space.
4. Enter the mount -a command so that the new mount points take effect.

Installation Procedure

This section explains how to install the DECtalk Software Development Kit. Topics include:

- Setting up the installation procedure
- Using the CD-ROM distribution media
- Using an RIS distribution area
- Starting the installation procedure

- Selecting subsets
- Stopping the installation

Installing DECtalk Software takes approximately 5 minutes, depending on your type of media and system configuration.

Using the CD-ROM Distribution Media

The following procedure loads DECtalk Software files onto a disk belonging to the system where you perform the installation. When DECtalk Software is run, its executable images are mapped into memory on your system.

To install DECtalk Software from CD-ROM media:

1. Mount the media on the appropriate disk drive.
2. Log in as superuser login name root to the system where you will install DECtalk Software.
3. Make sure that you are at the root (/) directory by entering the following command:

```
# cd /
```
4. Specify the /cdrom directory to be the mount point for the distribution file system on the drive. If your drive is rz4c, enter the following command:

```
# mount -dr /dev/rz4c /cdrom
```
5. Enter a setld command that requests the load function -l and identifies the directory in the mounted file system where DECtalk Software subsets are located. For example, if the directory location for these subsets is /cdrom/4.0/DEV/, enter the following command:

```
# /usr/sbin/setld -l /cdrom/4.0/DEV/
```
6. The installation procedure now displays the names of DECtalk Software subsets and asks you to specify the subsets you want to load.

See *Starting the Installation Procedure* to continue the installation.

Using an RIS Distribution Area

If you are installing DECtalk Software subsets that reside in an /etc/ris RIS distribution area on a remote system, take the following steps:

1. Log in as superuser login name root to the system where you will install DECtalk Software.
2. Make sure that you are at the root directory (/) by entering the following command:

```
# cd /
```
3. Enter a `setld` command that requests the load function (-l) option and identifies the system where the DECtalk Software subsets are located. For example, if you are loading DECtalk Software subsets from a RIS distribution area on node axpmme, enter the following:

```
/usr/bin/setld -l axpmme
```
4. RIS now displays a menu that lists all the software subsets available to you and asks you to specify the subsets you want to load.

See *Starting the Installation Procedure* to continue the installation.

Starting the Installation Procedure

Before starting the installation procedure:

1. Log in as a superuser and verify that you are at the root directory.
Check to see if there are any previously installed DECtalk Software subsets by entering the following commands:

```
% su root  
# cd /  
# /usr/sbin/setld -i | grep DTKDEV
```
2. Deinstall any installed subsets with the prefix DTKDEV by entering the following commands:

```
# cd /  
# /usr/sbin/setld -d (name of subset)
```
3. Start the installation procedure by entering the following command:

```
# /usr/sbin/setld -l /dev/rmt0h
```
4. Respond to the installation procedure prompts as described in *Selecting Subsets*.

Selecting Subsets

This section presents a complete installation procedure, including all messages that are displayed on your screen during the installation.

You must specify which DECTalk Software subsets you want to load. If you specify more than one number at the prompt, separate each number with a space, not a comma.

```
# /usr/sbin/setld -l .
```

The subsets listed below are optional:

There may be more optional subsets than can be presented on a single screen. If this is the case, you can choose subsets screen by screen or all at once on the last screen. All of the choices you make will be collected for your confirmation before any subsets are installed.

- 1) DECTalk Software V4.61 for Tru64 UNIX Development Documentation.
- 2) DECTalk Software V4.61 for Tru64 UNIX Development Kit.
- 3) DECTalk Software V4.61 for Tru64 UNIX Release Notes.
- 4) DECTalk Software V4.61 for Tru64 UNIX Sample Programs.

Or you may choose one of the following options:

- 5) ALL of the above
- 6) CANCEL selections and redisplay menus
- 7) EXIT without installing any subsets

Enter your choices or press RETURN to redisplay menus.

Choices (for example, 1 2 4-6): 5

Next, the script lets you verify your choice. For example, if you enter 7 in response to the previous prompt, you will see the following display:

You are installing the following optional subsets:

```
DECTalk Software V4.61 for Tru64 UNIX Development Documentation.
DECTalk Software V4.61 for Tru64 UNIX Development Kit.
DECTalk Software V4.61 for Tru64 UNIX Release Notes.
DECTalk Software V4.61 for Tru64 UNIX Sample Programs.
Is this correct? (y/n): y
```

If the displayed subsets are not the ones you intended to choose, enter n. In this case, the subset selection menu is displayed again and you can correct your choice of optional subsets. If the displayed subsets are the ones you want to load, enter y. After you respond to this question, the rest of the installation proceeds automatically and all the selected subsets are loaded. A sample of the rest of the installation script is listed below.

```
Checking file system space required to install selected subsets:
File system space checked OK.
4 subset(s) will be installed.
Loading 1 of 4 subset(s)....
DECTalk Software V4.61 for Tru64 UNIX Development Documentation.
Copying from . (disk)
Verifying
```


Loading 2 of 4 subset(s)....

```
*****
*
*   DECTalk Software Application Services V4.61
*   Development Subset
*
*   Copyright©Force Computers, Inc., 2000 All Rights Reserved
*
*   Unpublished rights reserved under the copyright laws of the United
*   States. The software contained on this media is proprietary to
*   and embodies the confidential technology of Force Computers, Inc.
*   Possession, use, duplication, or dissemination of the
*   software and media is authorized only pursuant to a valid written
*   license from Force Computers, Inc.
*
*****
```

DECTalk Software V4.61 for Tru64 UNIX Development Kit.
Copying from . (disk)
Verifying

Loading 3 of 4 subset(s)....

```
*****
*
*   DECTalk Software Application Services V4.61
*   Sample Programs Subset
*
*   Copyright©Force Computers, Inc., 2000 All Rights Reserved
*
*   Unpublished rights reserved under the copyright laws of the United
*   States. The software contained on this media is proprietary to
*   and embodies the confidential technology of Force Computers, Inc.
*   Possession, use, duplication, or dissemination of the
*   software and media is authorized only pursuant to a valid written
*   license from Force Computers, Inc.
*
*****
```

DECTalk Software V4.61 for Tru64 UNIX Sample Programs.
Copying from . (disk)
Verifying

Loading 4 of 4 subset(s)....
DECTalk Software V4.61 for Tru64 UNIX Release Notes.
Copying from . (disk)
Verifying

4 of 4 subset(s) installed successfully.

```
*****
DECTalk Software V4.61 development documentation subset (DTKDEVDOC461)
```

installation completed successfully. This installation puts the DECTalk Software online help in html format in the following directory:
/usr/opt/DTKDEV461/docs/html
You can use a web browser to view the online help. Start by opening the file:
/usr/opt/DTKDEV461/docs/html/defaultdectalk.html

.....

Configuring "DECTalk Software V4.61 for Tru64 UNIX Development Documentation." (DTKDEVDOC461)

.....

DECTalk Software V4.61 development subset (DTKDEV461) installation completed successfully.

.....

Configuring "DECTalk Software V4.61 for Tru64 UNIX Development Kit." (DTKDEV461)

.....

DECTalk Software V4.61 sample program subset (DTKSAMP461) installation completed successfully. This installation puts the sample programs in the following directory:
/usr/examples/dtk/dtsamples

.....

Configuring "DECTalk Software V4.61 for Tru64 UNIX Sample Programs." (DTKSAMP461)

.....

DECTalk Software V4.61 development release notes subset (DTKDEVRELN461) installation completed successfully. This installation put DECTalk Software development kit release notes in the following directories:
/usr/opt/DTKDEV461/docs/ascii
/usr/opt/DTKDEV461/docs/postscript

.....

Configuring "DECTalk Software V4.61 for Tru64 UNIX Release Notes." (DTKDEVRELN461)

#

Stopping the Installation

To stop the installation procedure at any time, press Ctrl/C. Then, interactively delete the files created by the installation up to the point where you stopped the installation. The directories and files created during the DECTalk Software installation are listed in the following file:

```
/usr/opt/DTKDEV461/docs/ascii/filelist.txt
```

If you encounter any failures during installation, see *Reporting Problems*.

You may interrupt the installation procedure at any point. However, if you do, the installation may not be left in a useful state. Remove all the subsets you installed and reinstall them.

Post-Installation Tasks

This section explains post-installation tasks you need to do after the development kit installation to make DECtalk Software ready for use. Topics include:

- Running the installation verification procedure
- Deleting DECtalk Software from your system
- Displaying documentation
- Correcting problems during product installation
- Reporting problems

Running the Installation Verification Procedure

You can run the installation verification procedure (IVP) during the installation or you can run the IVP independently after installing DECtalk Software to verify that the software is available on your system. You might also want to run the IVP after a system failure to be sure that users can access DECtalk Software.

To run the IVP, enter the commands:

```
% su root
#/usr/sbin/setld -v DTKRT461
```

The DECtalk Software IVP verifies the installation as follows:

1. A check for a valid LMF license is made. If no license is found, the IVP fails because the software cannot be tested.
2. DECtalk Software requires that the Multimedia Software for Tru64 UNIX server mmeserver be up and running. If the mmeserver is not already running, the IVP fails. Start the server and try again.

To start the server follow the sequence shown below:

```
% su root
# mmeserver&
```

Deleting DECtalk Software from Your System

If you must remove a version of DECtalk Software from your system, delete each subset that you previously installed.

For example to delete a subset, do the following:

1. Log in as superuser login name root, as follows:

```
% su root
```

2. Verify you are at the root directory (/) by entering the following command:

```
# cd /
```

3. Enter the following form of the `setld` command:

```
# setld -i | grep DTK
```

4. Look for the word installed in the listing produced, and then delete the installed subsets. For example:

```
# setld -d DTKDEV461
# setld -d DTKDEVDOC461
```

Displaying Documentation

The DECtalk Software documentation is provided in PDF, Postscript, and HTML file formats on the distribution CD-ROM. You can display the files on your workstation using Adobe Acrobat Reader, a Postscript reader, or a browser application.

After a successful installation, DECtalk Software online help is accessible in two forms:

- Reference (man) pages – Invoke reference page help for the DECtalk utilities (such as **speak**) and API functions from the UNIX command line with the **man** command. The reference pages are installed to the `docs/man/man1` subdirectory of the Runtime Kit directory tree and to the `docs/man/man3` subdirectory of the Development Kit directory tree.
- HTML Help – Start HTML Help by launching a web browser and loading the online help file `defaultdectalk.html` on the CD-ROM. Also, if you installed the DECtalk Software Development Documentation subset

(DTKDEVDOCnnn), the online help can be found in the docs/html subdirectory of the Development Kit directory tree.

The DECtalk Software HTML Help files include guide and reference information about the following DECtalk features:

- **DECtalk Software applets**
 - Select DECtalk Software and then the DECtalk Applet Master Index.
- **DECtalk Software API functions**
 - Select the Programmer's Guide and then the Introduction to the DECtalk Software API.
 - Select the Reference Guide and then DECtalk Software API Functions.
- **DECtalk Software in-line commands**

Select the Reference Guide and then one of the following:

 - DECtalk Software In-Line Commands.
 - Using In-Line Commands.

Correcting Problems During Product Installation

If errors occur during the installation, the system displays failure messages. For example, if the installation fails due to insufficient disk space, a message similar to the following is displayed:

```
There is not enough space for subset SUBSET_NAME
SUBSET_DESCRIPTION (SUBSET_NAME) will not be loaded.
```

where SUBSET_NAME is the name of the subset and SUBSET_DESCRIPTION is the description of the subset.

For example, "DTKDEVRELNOT461" is a subset name, and "DECtalk Software for Tru64 UNIX Release Notes V4.61" is a subset description.

Errors can occur during the installation if any of the following conditions exist:

- Operating system version is incorrect.
- Prerequisite software version is incorrect.
- Disk space is insufficient.
- System parameter values for successful installation are insufficient.

For descriptions of error messages generated by these conditions, see the Tru64 UNIX documentation on system messages, recovery procedures, and software installation.

Reporting Problems

If an error occurs while DECtalk Software is in use and you believe the error is caused by a problem with the product, take one of the following actions:

- If you purchased DECtalk Software from an Authorized Distributor or Reseller, contact your Authorized Distributor or Reseller for support.
- If you purchased or licensed DECtalk Software *directly* from Force Computers, Inc., contact Force's Field Services Division (FSD), Technical Support, at 408-369-6000 (US) or +49-89-60814-555 (Europe & other non-US).

For up-to-date information about support options, visit the Force DECtalk web site at: <http://www.forcecomputers.com/product/dectalk/dtalk.htm>.

A

authorization keys, 4-4

D

DECtalk

audio sound card, requirements for, 1-2, 2-4, 3-3
disk space requirement, 1-3, 2-4, 3-3
installation procedure, 1-4, 2-5
using online help, xi, 1-36, 2-23

DECtalk Software runtime kit, 4-3

delete a subset, 4-32

distribution area, RIS, 4-11, 4-26

documentation, 1-1, 1-36, 2-2, 2-23, 3-1, 3-7, 4-3,
4-17, 4-19, 4-32

E

errors, 4-33

F

free space, 4-24, 4-26

H

Hardware requirements, 3-3

I

Installation

disk space requirement, 1-3, 2-4, 3-3
hardware requirements, 3-3
preparation for, 1-2, 2-3, 3-2
reading the release notes, 3-3
software requirement, 1-3, 2-4, 3-3

trouble shooting, 1-37, 2-24, 3-8
installation verification procedure (IVP), 4-31
installation procedure
stop, 4-15
Installation Verification Procedure (IVP), 4-16

K

kit

runtime, 4-10

L

license, 4-5

License Management Facility, 4-4, 4-20

License PAK registration requirements, 4-21

License PAKs, 4-4

license product authorization keys, 4-4

O

Online help

how to use, xi, 1-36, 2-23

P

PAKs, 4-4

post-installation tasks, 4-15, 4-31

preinstallation tasks, 4-4, 4-20

product authorization keys, 4-4

R

register a license, 4-5, 4-21

registration requirements, 4-21

release notes, 4-4, 4-20

Release notes, 3-3

RIS distribution area, 4-11, 4-26

runtime kit, 4-3

runtime kit, 4-10

S

software development kit, 4-25

software distribution kit, 4-6

stop the installation procedure, 4-15

T

tasks

post-installation, 4-15, 4-31

preinstallation, 4-4, 4-20

total space, 4-24, 4-26